

EVERY NEWBORN PROGRESS REPORT



2019

Every newborn progress report 2019

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List of abbreviations

ANC	Antenatal care
BFHI	Baby-friendly Hospital Initiative
COINN	Council of International Neonatal Nurses
CRC	Convention on the Rights of the Child
CRVS	Civil registration and vital statistics
DAC	Development Assistance Committee
DHS	Demographic and Health Surveys
ECHO	Extension for Community Health-care Outcomes
ENAP	Every Newborn Action Plan
GFF	Global Financing Facility
HMIS	Health management information system
HNN	Healthy Newborn Network
HR	Human resources
HSA	Health surveillance assistants
ICM	International Confederation of Midwives
INAP	India Newborn Action Plan
KMC	Kangaroo mother care
LMICs	Low and middle income countries
LMIS	Logistics management information system
LSHTM	London School of Hygiene & Tropical Medicine
MCSP	Maternal and Child Survival Program
MDSR	Maternal death surveillance and review
MICS	Multiple Indicator Cluster Surveys
MNCH	Maternal, newborn and child health
MNH	Maternal and newborn health
MPDSR	Maternal and perinatal death surveillance response
NMR	Neonatal mortality rate
ODA	Official development assistance
PMNCH	Partnership for Maternal, Newborn and Child Health
PNC	Postnatal care
RMC	Respectful Maternity Care
RMNCAH	Reproductive, maternal, newborn, child and adolescent health
SAWG	Stillbirth Advocacy Working Group
SBA	Skilled birth attendant
SBCU	Special baby care unit
SBR	Stillbirth rate
SDG	Sustainable development goal
SRH	Sexual and reproductive health
UHC	Universal health coverage
UNFPA	United Nations Population Fund
UNICEF	United Nations Children's Fund
USAID	United States Agency for International Development
WASH	Water, sanitation and hygiene
WHO	World Health Organization

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Executive summary

The past 30 years have seen remarkable progress in child survival and newborn health in all regions of the world.

The global Newborn Mortality Rate declined by more than half between 1990 and 2018, from 37 deaths per 1000 live births to 18 deaths per 1000 live births (1).

Yet, the fact remains, the risk of dying is highest in the time around birth and the first month of life.

Newborn deaths represent 47% of all under-5 child mortality, accounting for 2.5 million deaths in 2018 (2). This is 7000 newborn deaths each day. Ninety-eight per cent of newborn mortality occurs in low- and middle-income countries (LMICs) and 78% occur in sub-Saharan Africa and Asia. In addition, 2 million stillbirths are estimated to have occurred in 2017; 50% of these were intrapartum stillbirths (3) where death occurs after the onset of labour and before delivery, with the infant born without signs of life. An estimated 98% of stillbirth occur in LMICs and the third semester stillbirth rate in south Asia and Sub-Saharan Africa is approximately 10 times that of developed countries (4).

The Every Newborn Action Plan (ENAP) estimated that 3 million lives – mothers, newborns and stillbirths - could be saved each year with universal coverage of quality maternal and newborn care (5).

Furthermore, 1.3 million newborns survive each year with major disabilities. Most disabilities are preventable and disability is a sensitive marker of the quality of maternal and newborn care (6).

The unfinished business of ending preventable newborn deaths and stillbirth looms large.

It is estimated that about 140 million births will occur per year by 2030. At the current rate of progress, and 26 million newborns will die by 2030 (7). Based on current trends, an equal number of families will experience a stillbirth. Through strategic priority setting, we can change this.

Strengthening health systems to deliver the best outcomes for the 140 million births per year with the strategic adoption and effective implementation of policies, programmes and technologies that can target the leading causes death and disability holds great promise for global health progress.

“High-quality health systems could prevent 1 million newborn deaths and half of all maternal deaths each year” (8).

Delivering universal, high-quality maternal and newborn care requires many concrete actions that are well known and within most countries’ capacity to implement. The necessary elements include ensuring the availability of essential medicines and commodities; compliance with evidenced-based clinical interventions and practice; an adequate hygiene infrastructure; competent and motivated staff; as well as solid documentation and use of information. In summary, it requires an intensive effort that will transform care at a critical time in the life-cycle. Taking action will have a powerful positive impact on the health and life opportunities of future generations.

ENAP set out evidence-based solutions and a clear road map to 2030 with newborn mortality and stillbirth reduction targets, health intervention coverage targets as well as specific milestones to meet by 2020 (9).

Goal 1. Ending preventable newborn deaths: By 2030, all countries will have reached the target of 12 or fewer newborn deaths per 1000 live births and will continue to reduce death and disability, ensuring that no newborn is left behind. An NMR of 15 is required by 2020 to be on track for this goal.

Goal 2. Ending preventable stillbirth: By 2030, all countries will have reached the target of 12 or fewer stillbirths per 1000 total births and to continue to close equity gaps. An SBR of 14 is required by 2020 to be on track for this goal.

At the World Health Assembly in 2014, all 194 Member States endorsed ENAP goals and recommendations and committed to put them into action (10). ENAP aligns with the Sustainable Development Goals (SDG) target 3.2 and the *Every Woman, Every Child Global Strategy for Women’s, Children’s and Adolescents’ Health 2016-2030* (EWEC Global Strategy) (11). Implementing ENAP is fundamental to the achievement of the SDGs and the Global Strategy and in doing so can achieve the objectives of UNICEF’s *Every Child Alive* campaign and the “triple billion” targets of WHO’s 13th General Programme of Work (12, 13).

^a A newborn or neonatal death is defined as a death during the first 28 days of life.

^b The definition recommended by WHO for international comparison is a baby born with no signs of life after 28 weeks’ gestation.

Progress towards the Every Newborn 2020 Goals and Milestones

Goal 1: At the current rate of progress, 32% of countries will not meet the NMR of 15 by 2020. By 2018, 87% of countries have defined a newborn mortality reduction target.

Goal 2: At the current rate of progress, 59% of countries will not meet the SBR of 14 by 2020; 32% of countries have defined a stillbirth reduction target.

Milestones

ENAP set national milestones to 2020 that provide a road map for countries to drive progress to ensure quality universal care for all mothers and their children. The Every Newborn management team has consolidated these into six overarching milestones. Data collated in 2018 using the Every Newborn Tracking Tool have been compared for two sets of countries: firstly, for 90 countries that completed the tool and secondly, for a subset of 34 countries which are those countries with the highest burden (that is to say those 20 countries with the highest number of newborn deaths, 20 countries with the highest newborn mortality rate and 20 countries with the highest stillbirth rate).^c

Every Newborn Milestone 1: National plans

Review and sharpen national strategies, policies and guidelines for reproductive, maternal, newborn, child and adolescent health (RMNCAH) in line with the goals, targets and indicators in ENAP, including a clear focus on care around the time of birth and on small or sick newborns.

For all 90 countries:

- 87% have completed a newborn action plan or updated the maternal and newborn health (MNH) component in the RMNCAH plan.
- 87% have defined a newborn mortality reduction target, and 32% have defined a stillbirth reduction target; defining a newborn mortality reduction target is now a norm but defining a stillbirth target is not.

Highest burden countries:

- Of the 20 countries with the highest number of deaths: 95% have developed newborn plans and defined NMR reduction targets.
- Of the 20 countries with the highest NMR: 45% have developed newborn plans and defined newborn reduction targets.

Humanitarian and Fragile contexts:

- 42% of all countries have included newborn care in emergency preparedness plans.
- 80% of the 20 countries with the highest NMR are experiencing acute or protracted current humanitarian crises; half of these countries have integrated a newborn component into national emergency planning.

Every Newborn Milestone 2: Quality of care

Adopt standards of quality and indicators for assessing quality of maternal and newborn care at all levels of the health system; and ensure access to essential commodities for RMNCAH.

For all 90 countries:

- 44% have adopted guidelines and standards for quality of care improvement and 42% have developed a plan to implement these guidelines.
- 50% have an updated national policy or guideline on postnatal care.
- 50% have a national guideline or strategy for the care of small and sick newborns. This is less likely in countries with the highest burdens of newborn mortality.
- 58% of countries report having specialized training in place to ensure care for those born too soon, too small or who have become sick.
- 32% have an updated policy or guideline on kangaroo mother care (KMC), most since 2014. 28% report this is currently in progress.

Highest burden countries

- Of the 20 countries with the highest number of newborn deaths: 90% have adopted or are currently developing guidelines for quality of care improvement.
- Of the 20 countries with the highest NMR: 35% have adopted or are developing guidelines for quality of care improvement.

Every Newborn Milestone 3: Investment in health workforce

Develop or integrate costed human resources for health strategy into RMNCAH plans and ensure sufficient financial resources are budgeted and allocated. Ensure training, deployment and support of health workers, in particular midwifery personnel, nurses and community health workers.

For all 90 countries:

- 43% reported having an Human Resources plan or strategy for births to be attended by skilled health personnel; 62% reported having an educational pathway or on-the-job capacity-building for health providers to gain neonatal nursing competencies.

Highest burden countries:

- Across five aspects of maternal and newborn health workforce strengthening (developing a Human Resource strategy, a retention policy, competency training, continuing education and neonatal nursing competencies), there is progress in those countries with the highest number of deaths but not in countries with the highest NMRs.

Every Newborn Milestone 4: Community engagement, parent's voices and champions

Involve communities, civil society and other stakeholders to increase demand and ensure access to, and coverage of, essential maternal and newborn care. Parents' voices and champions shift social norms so that it is no longer acceptable for newborns to die needlessly, just as it has become unacceptable for women to die when giving birth.

For all 90 countries:

- 10% increase in the development of national advocacy and communications strategies between 2017 & 2018
- 46% included civil society in their maternal and newborn health technical working group membership and 60% included civil society in developing their national plan.
- A low level of national activities to ensure community engagement in national policy processes was reported and the reported coverage of community engagement activities is low.
- 38% had parent and community advocacy groups for maternal and newborn health.

Highest burden countries.

- 50% of all highest burden countries have prepared one or both of these strategies, whereas 33% had in 2017.
- 53% reported having parent and community advocacy groups; this is in progress in a further 12%.

Every Newborn Milestone 5: Data

Count every newborn by using and improving programmatic coverage data including equity and quality gap assessments. Institutionalize civil registration and vital statistics (CRVS), adapt and use a minimum perinatal data set, implement maternal and perinatal death surveillance and response.

For all 90 countries:

- 83% reported having a maternal death surveillance and review policy and 53% have a perinatal death review policy. Only 22% of countries have a perinatal death review indicator in their health management information system (HMIS).
- 41% reported having an HMIS indicator birth registration and 14% say this is in progress.
- 7% have included all four high-impact interventions in the national HMIS, compared to only 4% last year.

Highest burden countries:

- Between 2016 and 2018, 47% of countries developed a perinatal death review and response system but 44% do not have such a system.

Every Newborn Milestone 6: Research and innovation

Develop, adapt and promote access to devices and commodities to improve care for mothers and newborns around the time of birth, and agree on, disseminate and invest in a prioritized and coordinated research agenda for improving preterm and newborn health outcomes. Particular focus is required for stillbirths, which are often left out of the research agenda or left behind.

- 39% of countries have a prioritized research agenda.
- 44% of highest burden countries report having a research agenda that includes stillbirth research and social, behavioural and community engagement research.

Fast-progressing countries are adopting ENAP's recommended actions

Countries with high mortality levels have been making faster progress to reduce newborn mortality since 2000, that occurred during the 1990s. Of the cohort of 90 countries that completed the Every Newborn tracking tool in 2018, we can highlight 10 countries which have highest burdens of newborn mortality and yet have made considerable progress since 2000.

Within every region there are countries making rapid progress that neighbouring countries can learn from. Between 2000 and 2018, Rwanda reduced its NMR from 39 to 16, and average annual rate of reduction (AARR) of 5.1%. Ethiopia achieved a reduction from NMR 49 in 2000 to NMR 28 in 2018 and Malawi from 39 to 22. Over the same period, Bangladesh reduced

is NMR from 42 to 17 and India from 45 to 23.

Fig 16 demonstrates the AAR from newborn mortality in the fastest progressing countries between 2010 and 2018. Fast progressing countries report to have scaled-up policies and plans and programmatic responses in support of improved maternal and newborn health outcomes. The ten countries with the current high mortality burden are China, Bangladesh, Rwanda, India, Indonesia, Nepal, Egypt, Zimbabwe, Ethiopia, and Malawi. Using the tracking tool data, we can identify common policy and programmatic priorities that these group of 10 countries are pursuing.

Fig 17/Table 1 captures these findings which depict a higher propensity in the 10 'fast progressing' countries to implement policies and programmes to ensure improved maternal and newborn health outcome. It is evident that this group is moving faster than other high burden countries in adopting a broad range of recommended actions.

Table 1. Snapshot of policy and programmatic responses in fast progressing high burden countries

Country	Newborn plans/components are costed and budgets for current year	Defined NMR target	Plan Prepared with other sectors	Sub-national plans	New-born health focal point	Defined SBR reduction target	QI guidelines and standards	QI plan	Re-search agenda for newborn health	KMC guidelines	HR Strategy	Gain neonatal nursing competencies	Community mobilization strategy
Bangladesh													
China													
Egypt													
Ethiopia													
India													
Indonesia													
Malawi													
Nepal													
Rwanda													
Zimbabwe													
Total 10 %	80	90	90	70	100	60	90	80	60	60	70	90	80
% of all 90 countries	51	83	79	27	87	32	49	44	39	32	44	62	48

Next steps to reach global goals for newborn mortality and stillbirth reduction

Efforts must be intensified to address the causes of stillbirth, newborn death and disability, improving the quality of maternal and newborn care and scaling-up coverage of all proven interventions along the continuum of care. Without increased planning and investment, the SDG target for newborn mortality reduction is in jeopardy of not being reached. National leadership, domestic financing and donor support for increased sustained investment is particularly urgent in the following areas:

- In all high-burden countries, an urgent need exists for maternal and newborn health quality of care improvement planning and investments.
 - Policies to deliver quality people centred care, inclusive of antenatal and postnatal care, logistic management information systems, perinatal death audits and community engagement are being well implemented with full population coverage.
 - Costing and budgeting of national plans and directing investment to a complex response system that cuts across sectors including water, sanitation and hygiene (WASH), strategic education and human resourcing for health, particularly for quality midwifery and neonatal nursing competencies that are in high demand and short supply.
 - A well trained, mentored and supported workforce, and building the neonatal care competencies to ensure quality care for those babies born too soon, too small or who become ill.
 - The full integration of stillbirth into the quality of care improvement agenda with the recognition that most stillbirth, and without question, intrapartum stillbirth is a marker of quality of maternal care
- In technological innovations that can provide cost-effective springboards for progress: including better logistics' management to ensure that the essential commodities to save lives and prevent life-disability are at the point of service delivery; and improved digital health for health monitoring and outreach.
- In community engagement, which is nascent in most countries and yet fast-progressor countries demonstrate valuing and power of parents and communities in driving change for MNH.
- For research on newborn health, stillbirth and social and behavioural change education, investing in cadres of researchers, building expertise, disseminating and using the findings to inform policy development and implementation improvement.
- To improve data collection and use to ensure all deaths are reported and reviewed, and that a birth and death certificate is produced for every child, including stillbirths, key indicators are captured in health information management systems and programmatic coverage of health interventions is monitored to ensure universal access to and coverage of quality care.

For those countries with the highest rates of newborn mortality, 80% of which have experienced recent or continuing humanitarian crises, action is most urgently needed. First, to ensure that pregnant women and newborns are adequately included in emergency preparedness, recovery planning and investment; and second, to build responsive health systems for overall sustained development.



1. Introduction

Achieving the Sustainable Development Goals (2015-2030) and the *Global Strategy for Women's, Children's and Adolescents' Health (2016-2030)* is inextricably linked to successfully meeting the Every Newborn 2020 targets and milestones (Fig. 1) (1) (2).

In 2014, at the Sixty-seventh World Health Assembly, 194 Member States endorsed *Every Newborn: an action plan to end preventable deaths* (Resolution WHA67.10) (3); a road map of strategic actions to end preventable newborn mortality and stillbirths while also contributing to a reduction in maternal mortality and morbidity.

The Every Newborn Action Plan (ENAP) is based on the latest epidemiology, and on evidence of essential interventions and steps towards effective programme implementation at country level. ENAP sets out a clear path to 2020, with specific milestones and necessary changes,

to enable substantial reductions in mortality rates and to improve maternal and newborn health by 2030. ENAP is fundamental to achieving the United Nations Children's Fund (UNICEF)'s *Every child alive* campaign and the "triple billion" targets of the World Health Organization (WHO)'s 13th General Programme of Work (4) (5).

There is strong evidence of significant progress. Since 2015, countries have been adopting the Every Newborn tracking tool to chart progress towards the 2020 milestones. This report presents data from 90 countries collated in 2018 using the tracking tool. Monitoring progress helps to identify current needs and gaps related to each of the Every Newborn milestones; this progress report is published to increase understanding and to help coordinate our efforts to improve maternal and newborn health and to end preventable stillbirths.

Fig. 1. Every Newborn Goals and the Sustainable Development Goals

	SURVIVE End preventable deaths	THRIVE Ensure health and well-being	TRANSFORM Expand enabling environments
SDG targets	SDG 3.2: By 2030, end preventable deaths of newborns and children under 5 years of age, with all countries aiming to reduce neonatal mortality to at least as low as 12 per 1,000 live births and under-5 mortality to at least as low as 25 per 1,000 live births	SDG 3 and the Comprehensive implementation plan on maternal, infant and young child nutrition: By 2025, reduce low birth weight by 30% SDG 4.2: By 2030, ensure all girls and boys have access to quality early childhood development care and pre-primary education	SDG 3.8: Achieve universal health coverage by 2030 SDG 5: Achieve gender equality, empower all women, end gender-based violence

Source: Sustainable Development Goals (1), Every Newborn Action Plan (2)

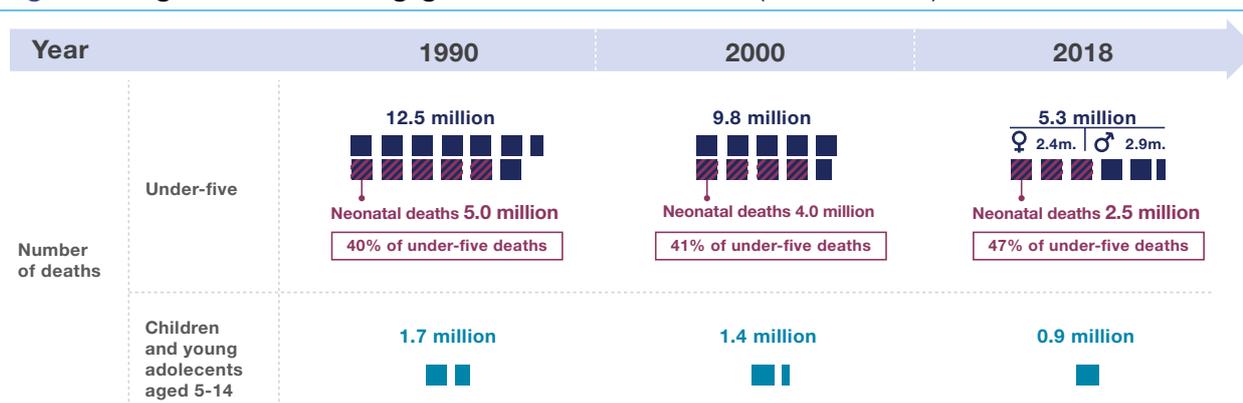
Newborn health and stillbirths: two essential global health priorities

The past 30 years have seen remarkable progress in child survival and newborn health in all regions of the world. The global NMR declined by more than

half between 1990 and 2018, from 37 deaths per 1000 live births to 18 deaths per 1000 live births (6) (Fig. 2).

There has been tremendous progress in many countries with the greatest burden of newborn deaths: Afghanistan, Bangladesh, China, Ethiopia, Ghana, Guinea-Bissau, India, Indonesia, Nepal, Malawi, Rwanda and Zimbabwe (8).

Fig. 2. Progress in reducing global newborn death (1990-2018)



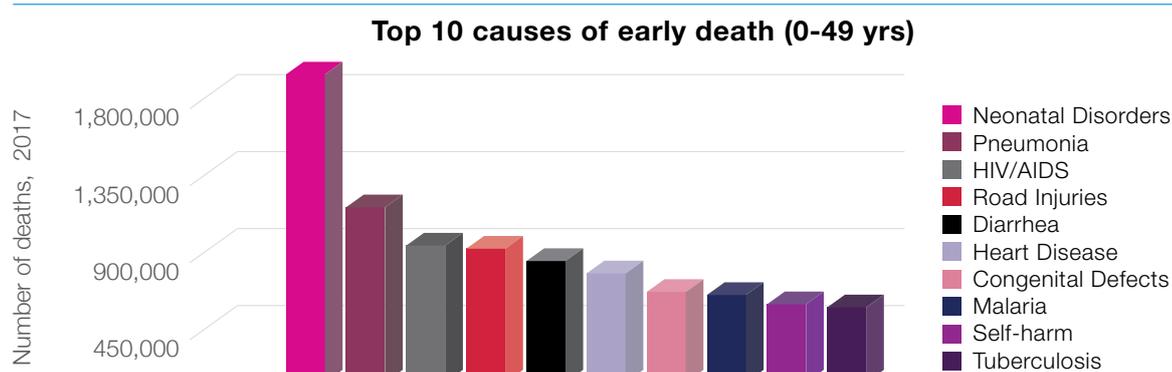
Source: Data from UNIGME 2018 report updated with new estimates for 2019.

Nonetheless, the fact remains that the risk of dying is still highest in the time around childbirth and in the first month of life. Newborn deaths now represent 47% of all under-5 child mortality, accounting for 2.5 million deaths in 2018 (9). This is 7000 newborn deaths each day. Seventy-eight per cent of newborn mortality occurs in sub-Saharan Africa and Asia. In addition, 2.6 million stillbirths are estimated to have occurred in 2018; 50% of these were intrapartum stillbirths (10) where death occurs after the onset of labour and before delivery, with the infant born without signs of life. Neonatal disorders are by far the largest cause of early mortality (0-49 years) as estimated by the Global Burden of Disease Study 2017 (11) (Fig. 3). Should the 1.3 million intrapartum stillbirths that occur in the time around birth be included, then the preventable loss of life is greater still.

It is estimated that 3 million lives – mothers, newborns and stillbirths – could be saved each year with universal coverage of quality maternal and newborn care (12). Additionally, 1.3 million newborns survive each year with major disabilities and most disabilities are preventable and disability is a sensitive marker of the quality of care (13).

The day of birth is undoubtedly the most dangerous day of life. Strategic adoption of policies, programmes and technologies targeting the leading causes of early death and disability, holds the greatest promise for global health progress. This also provides opportunities where country efforts, international health aid and investment can deliver maximum impact.

Fig. 3. Neonatal disorders: the number one cause of early death



AIDS: acquired immunodeficiency syndrome; HIV: human immunodeficiency virus.

Source: Global Burden of Disease Study 2017 (11).

^a A newborn or neonatal death is defined as a death during the first 28 days of life.

^b The definition recommended by WHO for international comparison is a baby born with no signs of life after 28 weeks' gestation.

Meeting the Sustainable Development Goals: Every Newborn and the Every Women Every Child Global Strategy

The EWEC Global Strategy (14) provides an implementation platform for the SDGs. EWEC aims to achieve the highest attainable standard of health for all women, children and adolescents and ensure that every newborn, mother and child not only survives, but thrives. Progress is monitored regularly using the key RMNCAH indicators established as the EWEC Monitoring Framework for the Global Strategy (15) (Box 1).

In 2018, the EWEC Global Strategy Monitoring Report concluded that three RMNCAH areas were experiencing the least progress: newborn health, humanitarian health and gender (16).

The health of newborns is a true barometer of progress towards universal health coverage and global health goals. Delivering universal quality maternal and newborn care requires many concrete actions: ensuring the availability of essential medicines and commodities; compliance with evidenced-based clinical interventions and practice; an adequate hygiene infrastructure; competent and motivated staff; as well as solid documentation and use of information. In summary, it requires an intensive effort that will transform care at a critical time in the life-cycle. The necessary elements of this effort are well known and within most countries' capacity to implement. Taking action will have a powerful positive impact on the health and life opportunities of future generations.

ENAP implementation underpins the Global Strategy by supporting government leadership and providing guidance on how to strengthen newborn health components within existing health sector plans, notably within the context of reproductive, maternal, child and adolescent health. It aims to achieve equitable coverage and high-quality care for women and newborns.

A comprehensive, multi-partner initiative, ENAP calls on all stakeholders to take specific actions to improve access to, and quality of, health care for women and newborns within the continuum of care for RMNCAH. ENAP estimated that 3 million lives – women, newborns and stillborn babies – could be saved each year by improving care around the time of birth and providing special care for small and sick newborns (17).

ENAP set out evidence-based solutions and a clear road map to 2020 with targets and specific milestones. At the World Health Assembly in 2014, all 194 Member States endorsed ENAP goals and recommendations and committed to put these into action. ENAP targets align with SDG target 3.2 and the EWEC Monitoring Framework for the Global Strategy.

Box 1. EWEC Global Strategy Indicators

Survive

1. Maternal mortality ratio (SDG 3.1.1)
2. Under-5 mortality rate (SDG 3.2.1)
3. Neonatal mortality rate (SDG 3.2.2)
4. Stillbirth rate
5. Adolescent mortality rate

Thrive

6. Prevalence of stunting among children under 5 years of age (SDG 2.2.1)
7. Adolescent birth rate (10-14, 15-19) per 1000 women in that age group (SDG 3.7.2)
8. Coverage index of essential health services, including for infectious diseases, noncommunicable diseases and RMNCAH: family planning, antenatal care, skilled birth attendance, breastfeeding, immunization, childhood illnesses treatment (SDG 3.1.2, 3.7.1, 3.8.1)
9. Out-of-pocket health expenditure as a percentage of total health expenditure
10. Current country health expenditure per capita (including specifically on RMNCAH) financed from domestic sources
11. Number of countries with laws and regulations that guarantee women aged 15-49 access to sexual and reproductive health care, information and education (SDG 5.6.2)
12. Proportion of population with primary reliance on clean fuels and technology (SDG 7.1.2)

Transform

13. Proportion of children under 5 years of age whose births have been registered with a civil authority (SDG 16.9.1)
14. Proportion of children and young people in schools with proficiency in reading and mathematics (SDG 4.1.1)
15. Proportion of women, children and adolescents subjected to violence (SDG 5.2.1, 16.2.3)
16. Percentage of population using safely managed sanitation services including a hand-washing facility with soap and water (SDG 6.2.1)

The Every Newborn vision, goals, guiding principles and strategic objectives by 2030

Vision

A world in which there are no preventable deaths of newborns or stillbirths, where every pregnancy is wanted, every birth celebrated, and women, babies and children survive, thrive and reach their full potential.

Goals

Goal 1: Ending preventable newborn deaths

By 2030, all countries will reach the target of 12 or less newborn deaths per 1000 live births and continue to reduce death and disability, ensuring that no newborn is left behind.

Goal 2: Ending preventable stillbirths

By 2030, all countries will reach the target of 12 or less stillbirths per 1000 total births and continue to close equity gaps.

Guiding principles

- Country leadership
- Human rights
- Integration
- Equity
- Accountability
- Innovation

Joint Strategic Objective: Every Newborn and Ending Preventable Maternal Mortality ⁽¹⁸⁾



1. Strengthen and invest in care around the time of birth, with a focus on improving quality and experience of care, while ensuring full integration of services for mothers and babies across the continuum of care.



2. Strengthen health systems to optimize the organization and delivery of care through the increased capacity of the workforce, greater access to essential commodities, and encouragement of innovation in care practices and technology.



3. Reach every woman and newborn by reducing inequities in coverage and access to care.



4. Harness the power of parents, families and communities and engage with society.



5. Improve data for decision-making and accountability.

Every Newborn national milestones to 2020

ENAP sets milestones to 2020 that provide a road map for countries to drive progress that ensures quality universal care. Within these milestones, maternal and newborn care services are to be provided in a comprehensive and integrated way, because the care each mother receives and ensures for her baby before, during and after childbirth is essential for newborn survival and optimal development. As work has progressed towards the national milestones, the Every Newborn management team has consolidated them into six milestones, shown in Table 2.

Table 2. Every Newborn national milestones to 2020

1. National plans	Review and sharpen national strategies, policies and guidelines for RMNCAH in line with the goals, targets and indicators in the ENAP, including a clear focus on care around the time of birth and small or sick newborns.
2. Quality of care	Adopt standards of quality and indicators for assessing quality of maternal and newborn care at all levels of the health system; and ensure access to essential commodities for RMNCAH.
3. Investment in health workforce	Develop or integrate costed human resources for health strategy into RMNCAH plans and ensure sufficient financial resources are budgeted and allocated. Ensure training, deployment and support of health workers, in particular midwifery personnel, nurses and community health workers.
4. Community engagement, including parents' voices and champions	Involve communities, civil society and other stakeholders to increase demand and ensure access to, and coverage of, essential maternal and newborn care. Parents' voices and champions shift social norms so that it is no longer acceptable for newborns to die needlessly, just as it has become unacceptable for women to die when giving birth.
5. Data	Count every newborn by using and improving programmatic coverage data including equity and quality gap assessments. Institutionalize CRVS, adapt and use a minimum perinatal data set, implement maternal and perinatal death surveillance and response.
6. Research and innovation	Develop, adapt and promote access to devices and commodities to improve care for mothers and newborns around the time of birth, and agree on, disseminate and invest in a prioritized and coordinated research agenda for improving preterm and newborn health outcomes. A particular focus is required for stillbirths, which are often left out or left behind.

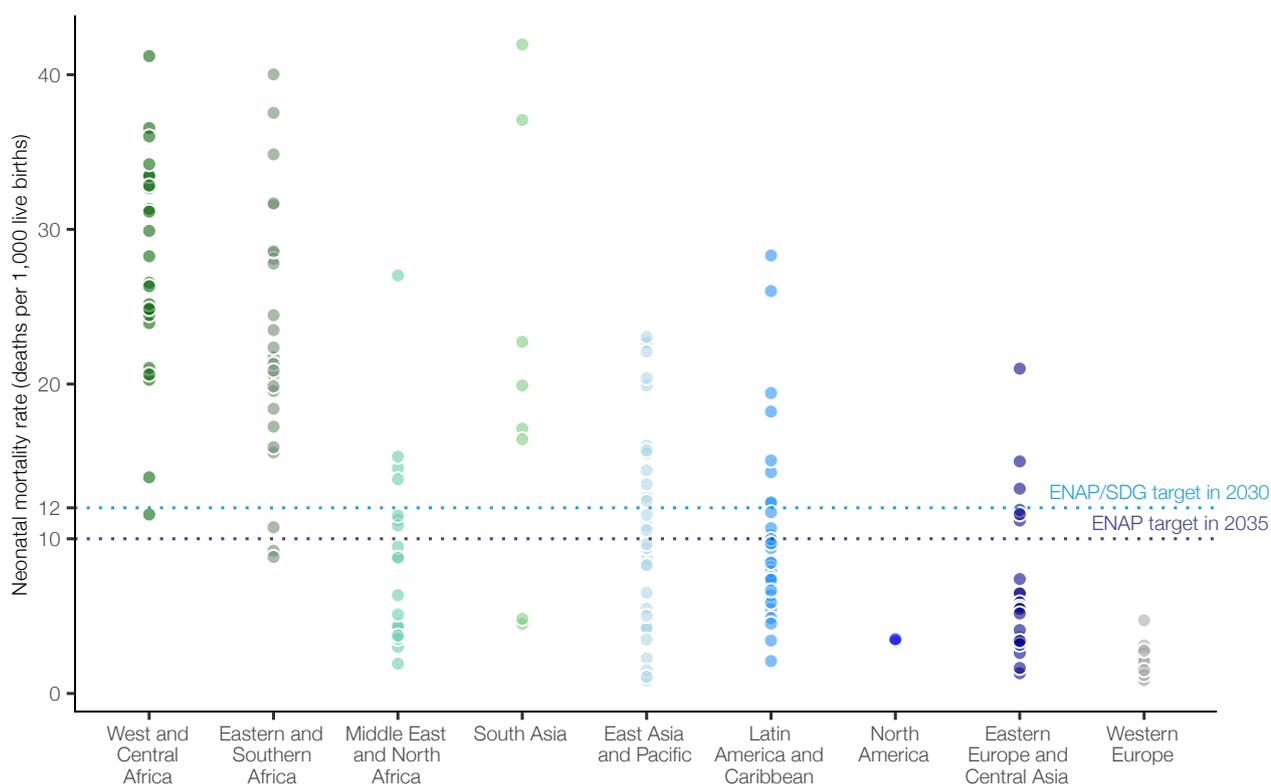
RMNCAH: reproductive, maternal, newborn, child and adolescent health.

2. SDG Newborn health goals & Every Newborn Action Plan goals and milestones to end preventable newborn death, stillbirth and disability

Increased planning and investment are critically needed to reduce newborn mortality and stillbirth and reach the SDG Goals. There are just 11 years remaining until 2030 for all countries to reach the goal of 12 or fewer newborn deaths per 1000 live births. If the current rate of progress continues, some countries will not reach this SDG target until 2090.

Fig. 4 shows the particular challenge facing many high-burden countries in south Asia and Africa to achieve the SDG target on newborn mortality. To do so, more than 60 countries need to accelerate progress and nearly 40 countries will currently need to double their annual rate of reduction. At the current rate of progress, half of these countries will not reach the target before 2050.

Fig. 4. Disparity in the level of neonatal mortality across countries and regions (2018)



ENAP: Every Newborn Action Plan; SDG: sustainable development goal.

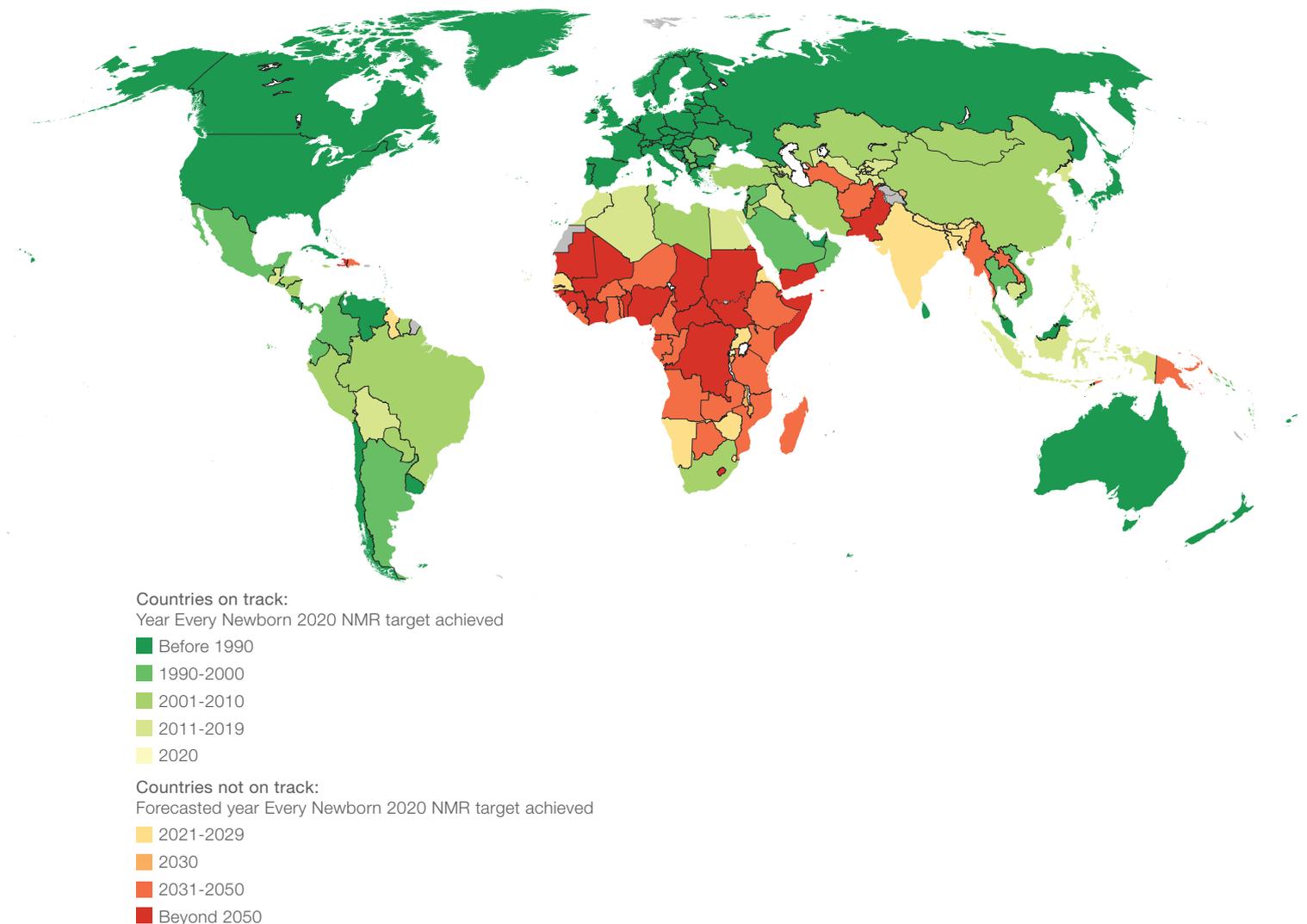
Source: United Nations Inter-agency Group for Child Mortality Estimation (UN IGME) 2019 (19).

Tracking progress to 2030 using the Every Newborn 2020 national targets and milestones

ENAP set newborn mortality and stillbirth reduction targets for 2020 as interim goal on the road to 2030: Every Newborn 2020 NMR target: no more than 15 deaths per 1000 live births;

Tracking current progress indicates that while many middle- and high-income countries will meet the Every Newborn 2020 NMR target, 32% of countries are currently not likely to do so (Fig. 5). The highest burdens are in sub-Saharan African and South Asia. In countries that have reached the national-level 2020 target of no more than 15 newborn deaths per 1000 live births, critical disparities at the subnational level still need to be addressed.

Fig. 5. Country progress to meet the Every Newborn NMR 2020 target



NMR: neonatal mortality rate.

Source: Prepared by UNICEF using 2018 UNIGME NMR estimates.

Road to 2020 and beyond; priorities for action to end preventable newborn death, stillbirth and life-long disabilities

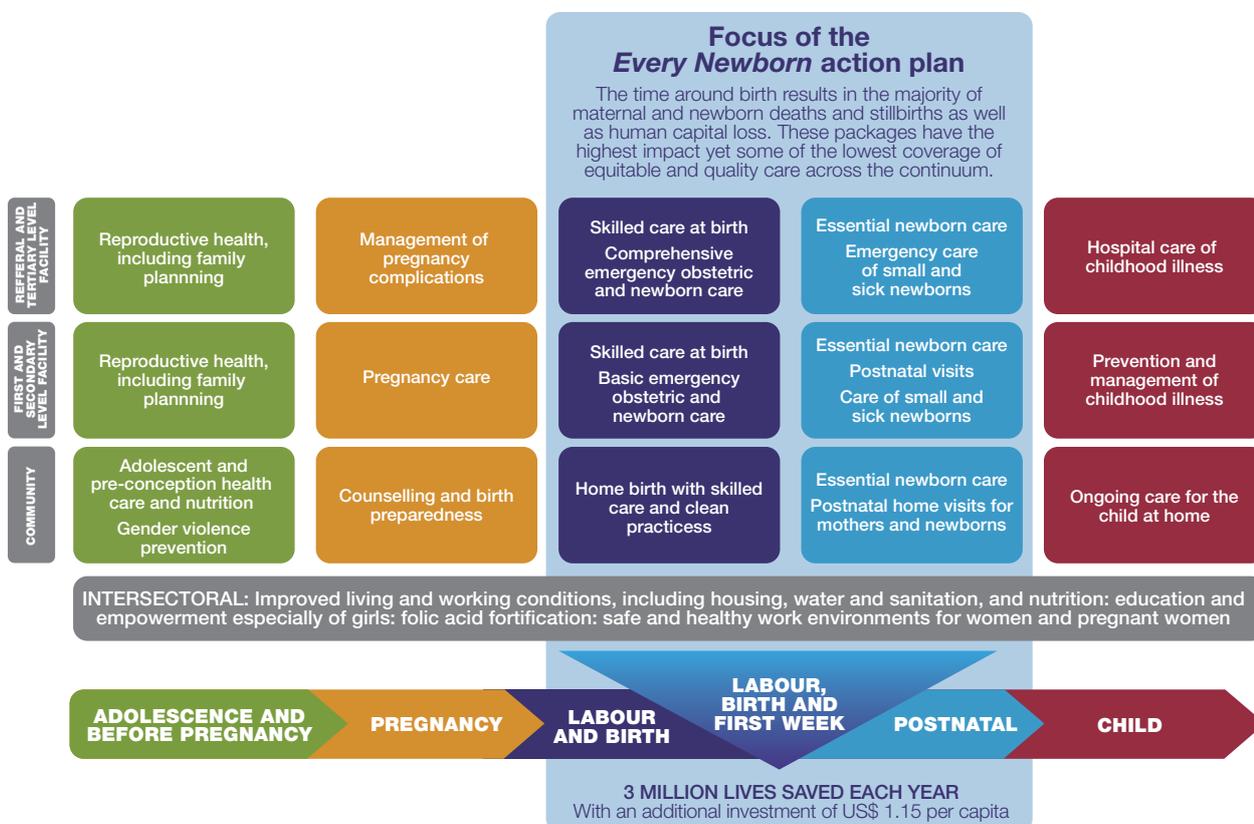
Ensuring increased planning and investment to implement the Every Newborn milestones by 2030 will help to reduce the large burden of mortality and morbidity. The outcome from setting maternal and newborn priorities goes beyond survival and means that newborns can thrive to reach their full developmental potential. Brain development is so vulnerable in the time around birth and the first days of life; ensuring good quality care will save lives and reduce disability and birth effects, and additionally enable the smallest and most vulnerable children to reach their potential to become thriving children, adolescents and adults. Through strategic priority-setting, we can achieve this.

Where the recommendations set out in the Every Newborn Action Plan are being implemented, progress is being made. As we monitor progress towards these targets and milestones, we see that priority-setting and intensive focus are yielding fast results.

By observing country progress, we can see that setting priorities and improving the quality of maternal and newborn care ignites the full-scale effort required to avert many millions of deaths and improve the health and life opportunities of many millions more. There are two urgent priorities:

- 1. Use our current knowledge which can avert 80% of current deaths and avert the majority of disabilities; by ensuring full population coverage of proven interventions along the continuum of care (Fig. 6) (21). This requires ensuring access to and delivery of quality maternal and newborn care**
- 2. Intensify our efforts where the largest numbers of death and largest rates of death occur, in high burden context, increasingly in humanitarian and fragile settings**

Fig.6. Continuum of care



Source: The Lancet Every Newborn Series. Mason et al (2014) (21).

2.1. Use our current knowledge to prevent and address the causes of newborn death, stillbirth and disability

More than 2.5 million babies died in 2018 from preventable causes; most notably prematurity, complications around the time of birth, infections and congenital conditions (Fig.7.) (22) Some died because the care they received was of poor quality; others because they received no health care at all. One third of deaths occur on the day of birth, and close to three-quarters die in the first week of life. To meet the SDG 3.2 target for newborn and child survival, countries need to transform newborn care.

We know the solutions for these causes of newborn death. While we continue to understand more about the causes of preterm birth, we currently have the knowledge to save 80% of global newborn deaths and avert most disabilities (23). See Box 2.

Over recent decades, good progress has been made in the reduction of maternal and newborn mortality, particularly with improving access to antibiotics and family planning. To make further progress in the countries with the highest burdens of stillbirth and newborn mortality and to avert disabilities, it is necessary firstly, to tackle more complex interventions such as delivery by skilled health personnel and the management of complications during delivery and in the post-natal period. Stronger emphasis is required on implementing programmes and policies at national and local levels that can drive improvement in quality care for those born too small or sick, or who become ill.

Access to life saving interventions for small and sick newborns can prevent death or lifelong disability. “*Small and sick*” refers to newborns who are of low-birth weight (< 2500 grams), preterm/before 37 weeks’ gestation, and also those of normal weight and gestational age but who are ill and require inpatient care. Every year, 30 million ‘small and sick’ newborns require specialized or intensive care in a hospital; those who survive often do so with preventable conditions and disabilities that will affect them for life. These newborns can and will thrive as productive members of our societies, provided they are given high-quality inpatient care at the right time and in the right place, including follow-up care (24).

Box 2. Causes of newborn death, stillbirth and disability

Globally, the main causes of newborn death are preterm birth (35%) and intrapartum complications mainly through brain injury (24%), infections (23%) and congenital conditions (11%) (25).

The leading causes of death vary depending on the level of NMR (Fig. 7.& 8.) (26):

- In all countries the leading cause of death is complications due to prematurity, most often acute respiratory infections.
- As mortality decreases, the causes of death change, which affects policies, programmes and monitoring, meaning we need to refocus our efforts. In countries with the high rates of newborn mortality, newborns are at much greater risk of death due to birth asphyxia and sepsis, tetanus and respiratory infections. As the newborn mortality rate declines, further causes needs to be effectively addressed in order to reduce mortality further. No country has reduced its NMR below 15 per 1000 live births without investment in specialist care for small and sick newborns (27).
- In the highest mortality settings, notably half of neonatal deaths are due to infections, often caused at the time of birth or related to hygiene, especially through the umbilical cord (28).

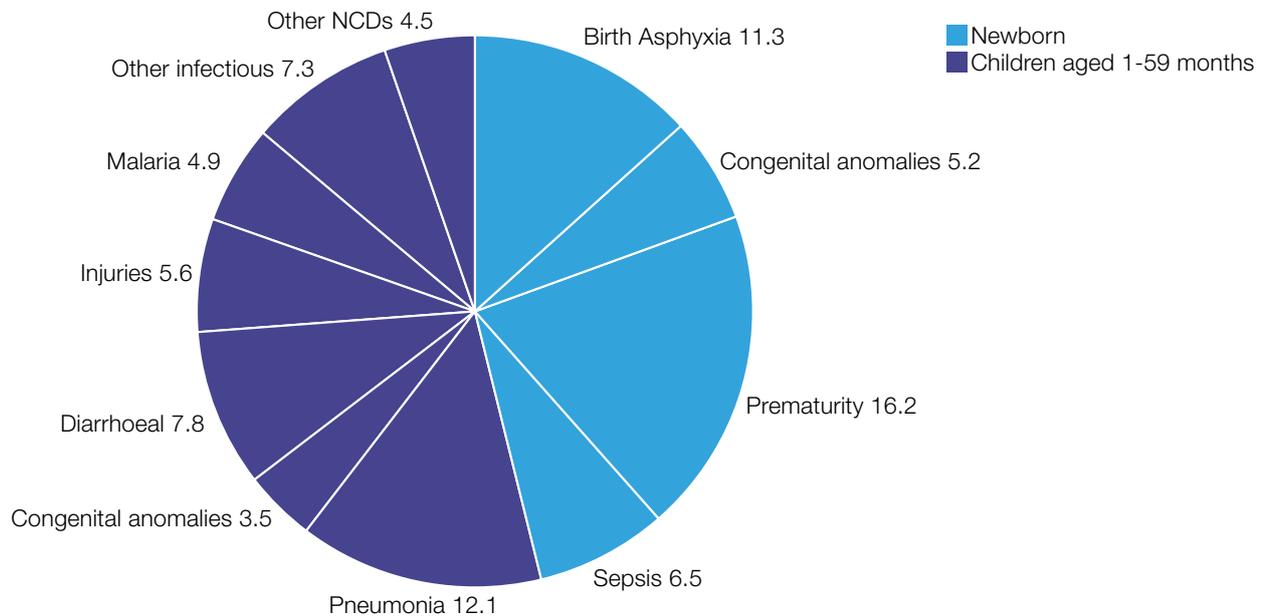
Half of all stillbirths are due to intrapartum events, during labour and delivery, which are preventable with quality care in the time around birth (29).

Most disabilities among newborns born after 25 weeks are preventable with quality maternal and newborn care. The risks varies greatly based on where the birth takes place. The risk of disability is twice as great in MICs than in HICs. Care of small and sick newborns is crucial for reducing death and disability (30).

1.7 million newborn lives could be saved each year by investing in access to quality care for every newborn, everywhere, including in humanitarian settings (31). While essential newborn care would benefit small and sick newborns, adding special and

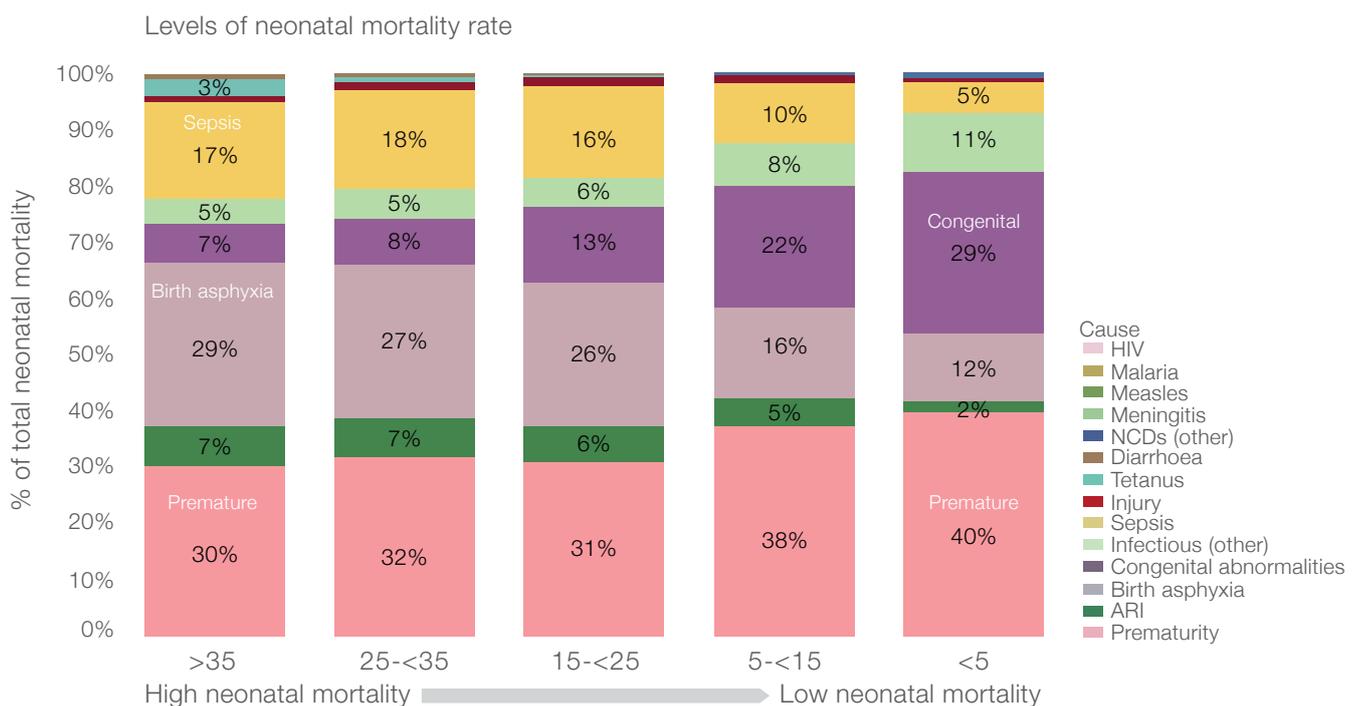
intensive care services for them would reduce neonatal mortality by almost 50%. It would also promote child development and foster economic productivity. This is possible by investing US\$ 0.70 per capita per year (32). Box 3.

Fig.7. Main causes of newborn death



Source: WHO and Maternal and Child Epidemiology Estimation Group (MCEE) estimates for child causes of death (Under 5) 2000-2017.

Fig.8. Cause of death at different NMR levels



ARI: acute respiratory infection; HIV: human immunodeficiency virus; NCDs: noncommunicable diseases.

Source: WHO-MCEE estimates for child causes of death 2000-2017. Geneva: World Health Organization (34).

Box 3. Survive and thrive: Transforming care for every small and sick newborn (WHO, 2018) ⁽³⁵⁾

Transforming care for the 30 million vulnerable newborns who are currently being left behind is a smart investment in the health and development of future generations. It will significantly move us along the path to achieving the United Nations Sustainable Development Goals (SDGs), through universal health coverage (UHC), by 2030.

This report outlines the global problem, showcases the progress, summarizes what can be done to transform inpatient care for small and sick newborns, and demonstrates the importance of data to guide investment and improve quality and equity. It presents a clear call to action to accelerate progress towards the SDGs to ensure every newborn has the chance to live a healthy and productive life. The report was led by WHO and UNICEF with support from multiple partners including 94 experts from sixteen countries. WHO will publish Standards of Care for Small and Sick Newborns, updating the current Standards and Guidelines for Maternal, Newborn and Child Health for strengthening and expanding neonatal care services.

Key Facts from the Survive and Thrive Report

- **Surviving**

An estimated 2.5 million newborns died in 2018, mostly from preventable causes, most notably prematurity, complications around the time of birth, infections and congenital conditions. Some died because the care they received was of poor quality; others because they received no health care at all. In order to meet the SDG 3.2 target for newborn and child survival, countries need to transform newborn care.

- **Thriving**

Every year, 30 million newborns require specialized or intensive care in a hospital; those who survive often do so with preventable conditions and disabilities that will affect them for life. These newborns can and will thrive as productive members of our societies, provided they are given high-quality inpatient care at the right time and in the right place, including follow-up care.

- **Transforming**

Cost-effective solutions exist for the main causes of neonatal death and disability. In line with the drive to achieve UHC, there must be innovation, people-centred care, locally designed technologies, financial protection, and parent power and partnership. Ensuring the recruitment, training and retention of skilled nurses is particularly crucial. Social norms also need to be transformed: neonatal mortality should not be considered inevitable.

- **Investing fairly**

1.7 million newborn lives could be saved each year by investing in access to quality care for every newborn, everywhere, including in humanitarian settings. While essential newborn care would benefit small and sick newborns, adding special and intensive care services for them would reduce neonatal mortality by almost 50%. It would also promote child development and foster economic productivity. This is possible by investing 0.70 USD per capita per year.

- **Counting**

Accelerating change requires improving routine collection of data, with a stronger focus on coverage, quality and outcomes. Existing data need to be better used for accountability and action. This report contributes to achieving the objectives set out in the Global Strategy for Women's, Children's and Adolescents' Health (2016–2030).

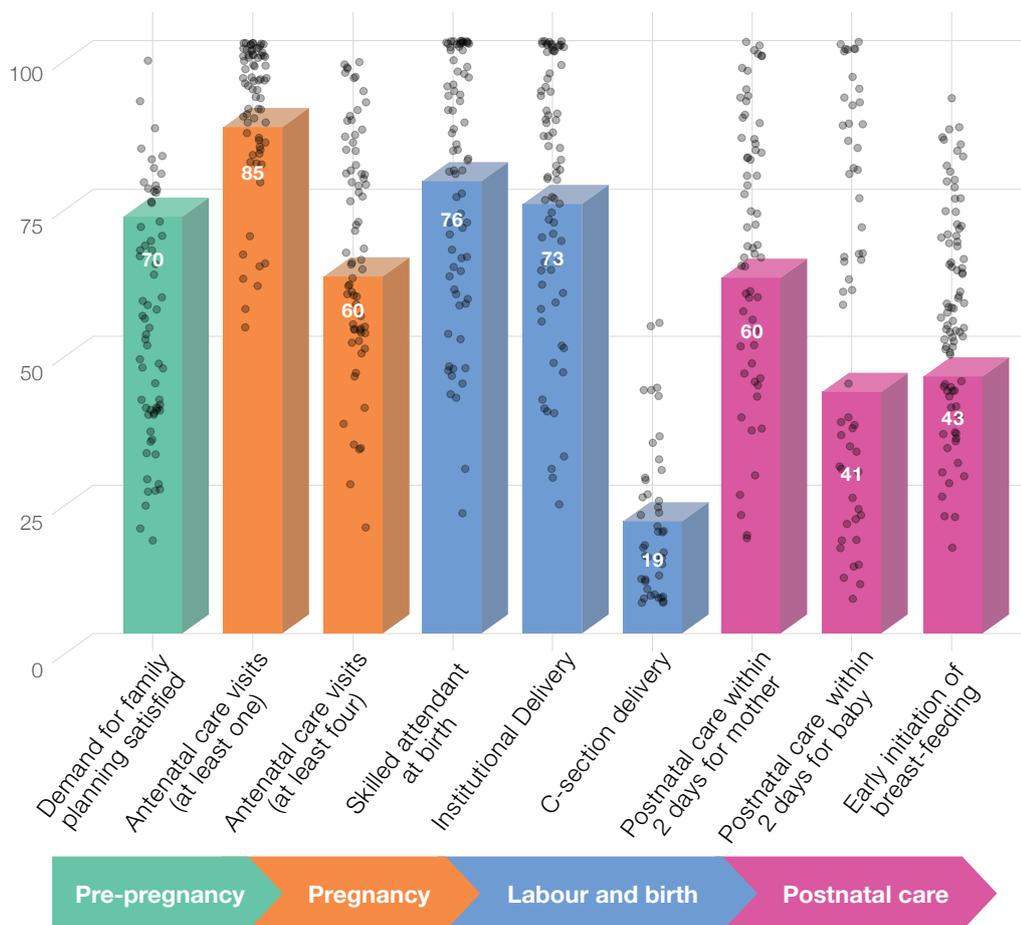
2.1.A Coverage of proven health interventions along the continuum of care

Ensuring access to key life-saving and health promoting interventions along the continuum of care is essential to progress (Fig. 9). Both between and within countries,

there is often a critical disparity in access to and coverage of lifesaving interventions.

Fig. 9 plots the variation in coverage of key interventions for the 90 countries that adopted the tracking tool in 2018. Where a child is born has significant implications for the opportunity to survive pregnancy and birth. Indeed, 98% of all newborn deaths and 98% of all stillbirths occur in low- and middle-income countries.

Fig. 9. Coverage of key interventions along the continuum of care in the 90 countries that completed the tracking tool in 2018

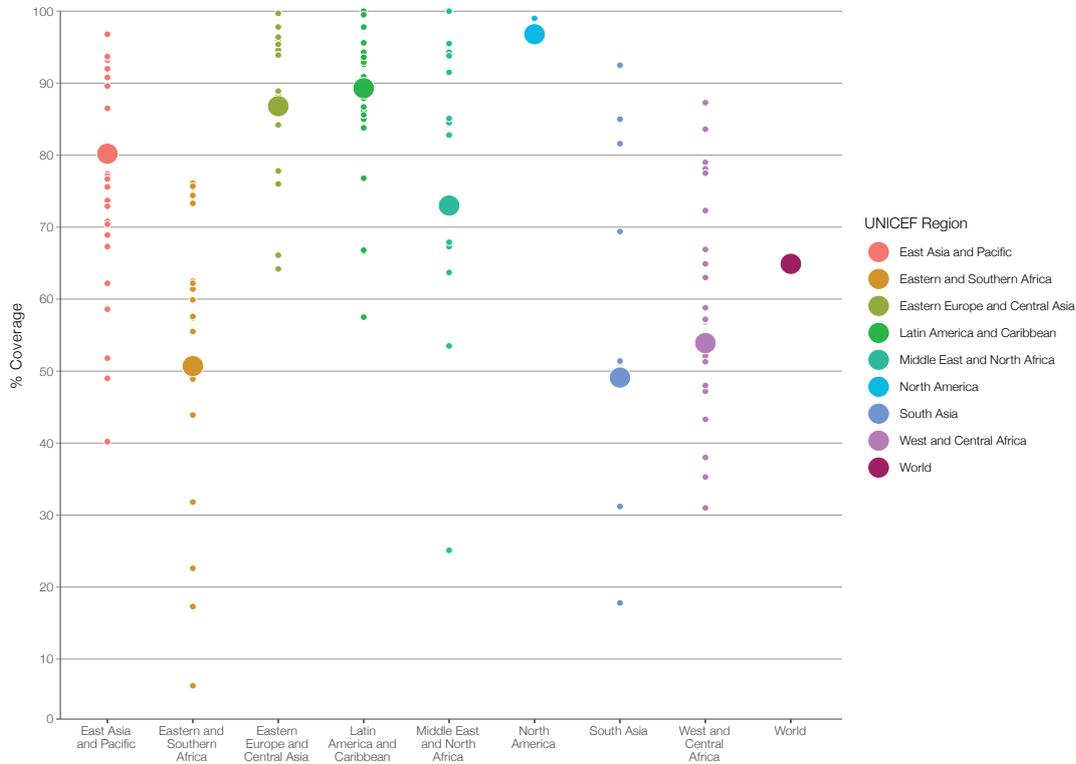


Source: UNICEF Global databases 2019, based on DHS, MICS and other national surveys. Chart from Countdown to 2030, Continuum of Care chart (36).

Current disparities between countries on the coverage of essential maternal and newborn care interventions

There is a large variation in the of coverage of essential life-saving interventions between countries.

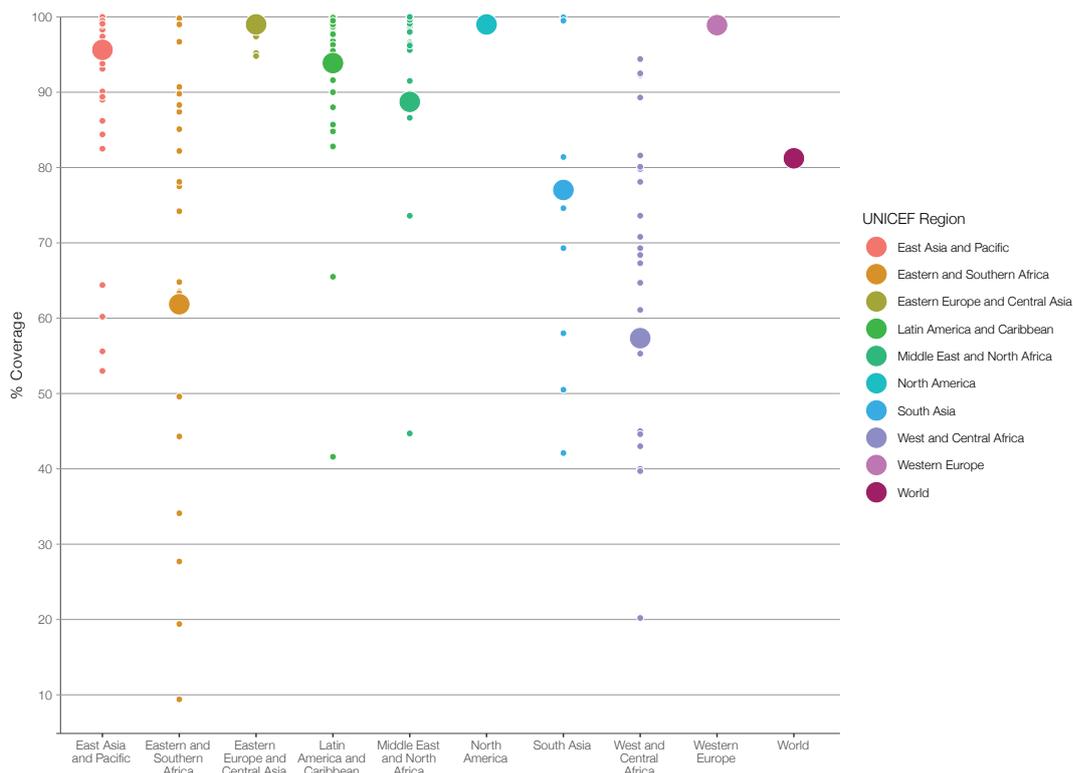
Fig. 10. Antenatal care: minimum of four visits (%)



Note: How to read the chart: each small bubble represents a country. Larger bubbles represent the regional value for each indicator. For some regions and indicators data were not enough to calculate a regional value, therefore the large bubble does not show in the chart.

Source: UNICEF, Data and Analytics, MNCAH Global databases May 2019, based on DHS, MICS and other national surveys (37).

Fig. 11. Coverage by skilled birth attendant (%)

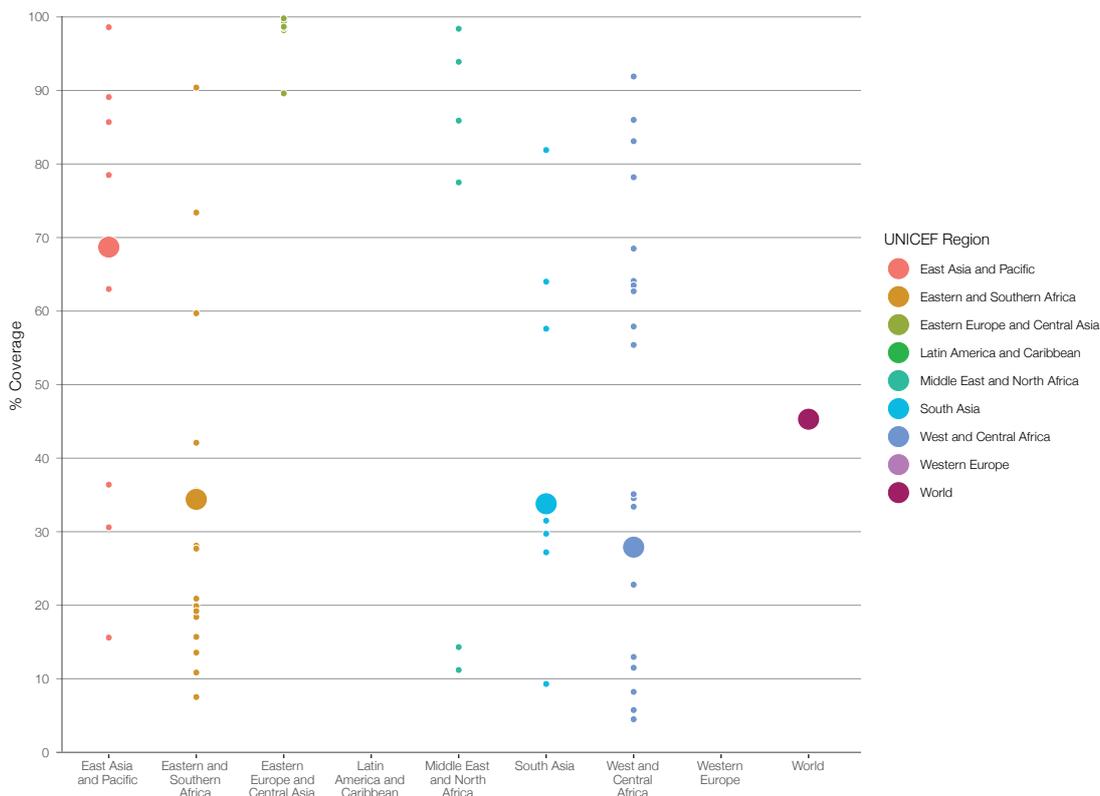


Note: How to read the chart: each small bubble represents a country. Larger bubbles represent the regional value for each indicator. For some regions and indicators data were not enough to calculate a regional value, therefore the large bubble does not show in the chart.

Source: UNICEF/WHO joint database for skilled attendant at birth SDG indicator 3.1.2 February 2019 (38).

Figs. 12-15 show poor coverage of postnatal care and initiation of breastfeeding across all regions.

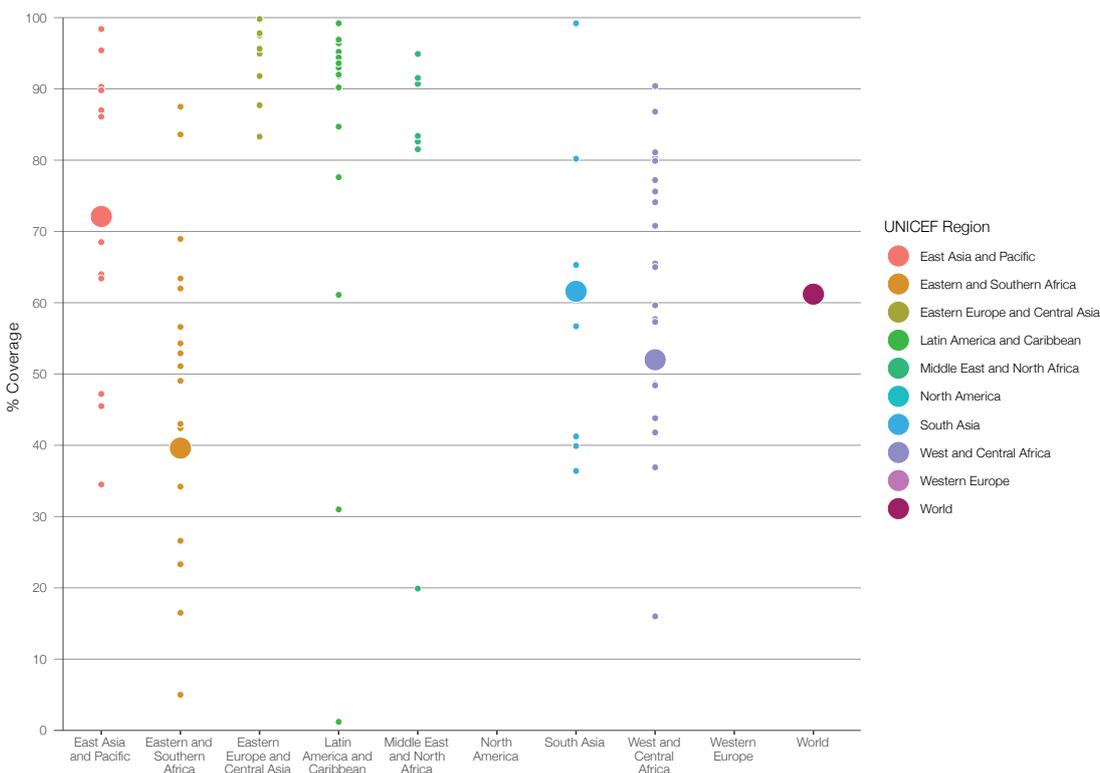
Fig. 12. Postnatal care for newborns within 2 days of delivery (%)



Note: How to read the chart: each small bubble represents a country. Larger bubbles represent the regional value for each indicator. For some regions and indicators data were not enough to calculate a regional value, therefore the large bubble does not show in the chart.

Source: UNICEF, Data and Analytics, MNCAH Global databases May 2019, based on DHS, MICS and other national surveys (39).

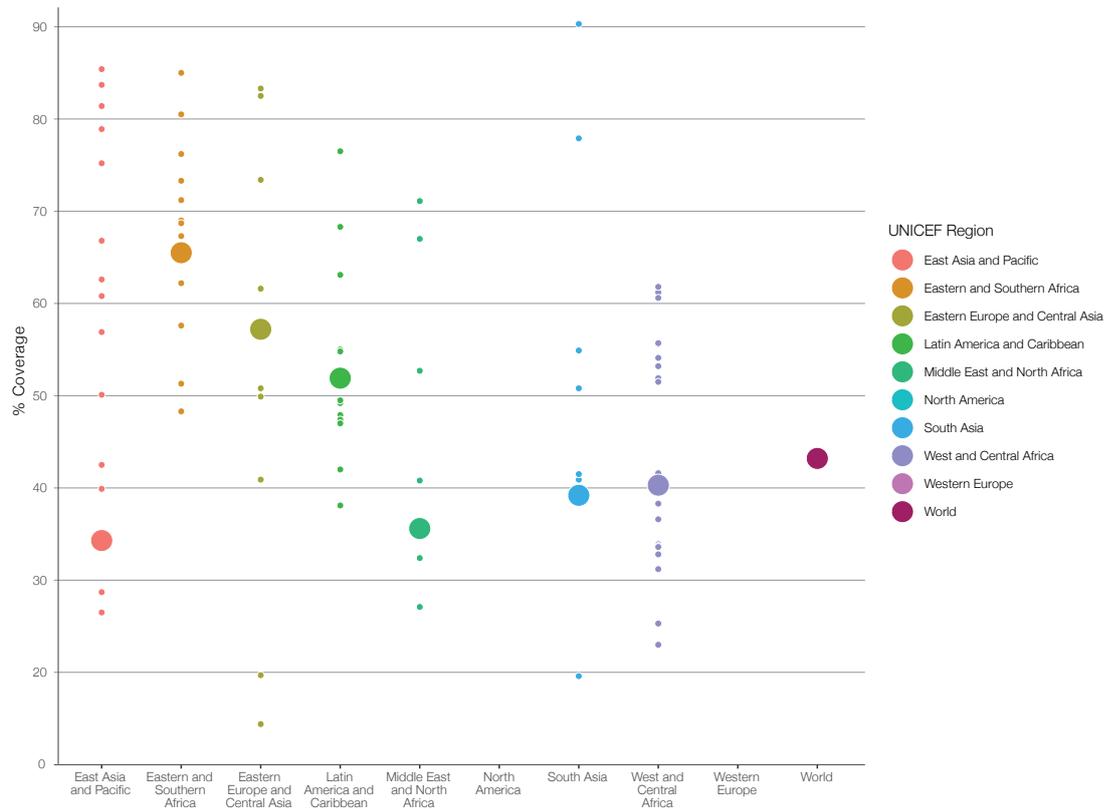
Fig. 13. Postnatal care for mothers within 2 days of delivery (%)



Note: How to read the chart: each small bubble represents a country. Larger bubbles represent the regional value for each indicator. For some regions and indicators data were not enough to calculate a regional value, therefore the large bubble does not show in the chart.

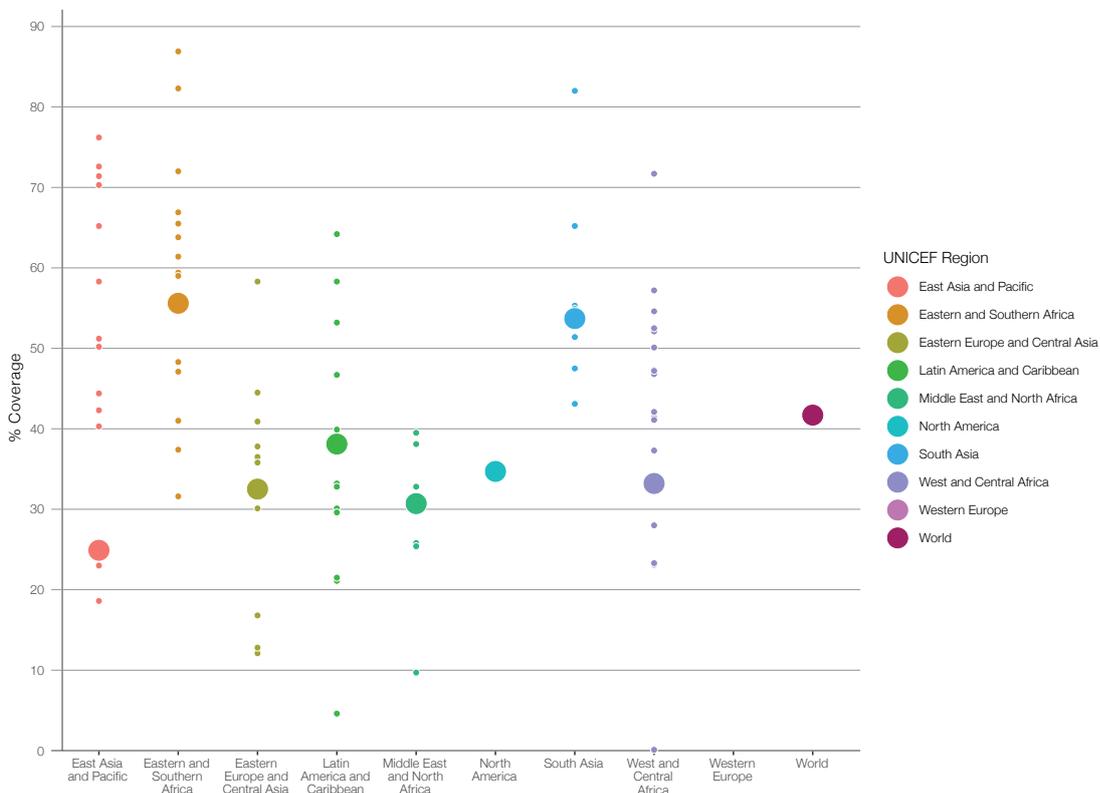
Source: UNICEF, Data and Analytics, MNCAH Global databases May 2019, based on DHS, MICS and other national surveys (41).

Fig. 14. Early initiation of Breastfeeding (%)



Note: How to read the chart: each small bubble represents a country. Larger bubbles represent the regional value for each indicator. For some regions and indicators data were not enough to calculate a regional value, therefore the large bubble does not show in the chart.
 Source: UNICEF, Data and Analytics - Nutrition: Global Infant and Young Child Feeding Databases, May 2019 (43).

Fig. 15. Exclusive Breastfeeding to 6 months (%)



Note: How to read the chart: each small bubble represents a country. Larger bubbles represent the regional value for each indicator. For some regions and indicators data were not enough to calculate a regional value, therefore the large bubble does not show in the chart.
 Source: UNICEF, Data and Analytics - Nutrition: Global Infant and Young Child Feeding Databases, May 2019 (42).

2.1.B Quality maternal and newborn care

Health systems that will deliver full population coverage of quality care are crucial to ending preventable deaths and disabilities. This means ensuring that when care is provided, it is quality care maternal and newborn care. Providing health services without guaranteeing a minimum level of quality is ineffective, wasteful, and unethical (43). The Lancet Commission for High Quality

Health Systems in the Sustainable Development Era (2018) concluded that 61% of newborn deaths are due to the delivery of poor quality care as opposed to non-utilisation of care (44). The Commission has outlined the clear roles for core actors in order to contribute to a coordinated and collaborative effort towards high-quality health system strengthening.

The Every Newborn Milestones are tracking progress at the country level on the policy and programmatic actions to delivering quality care.



Box 4. High-Quality Health Systems in the Sustainable Development Goals Era: Time for Revolution ⁽³⁸⁾

What national governments can do?

- **Invest in health systems, and make them more accountable to people**
 1. Pass legislation for people's right to quality healthcare and enact regulations that set rigorous standards
 2. Educate the population and promote civic participation through social accountability mechanisms and processes for remedy and redress
 3. Partner with other sectors in order to create conditions for health system reform
- **Embed quality of care in UHC;** establish national quality guarantees for services provided through Universal Service Charge that ensure equity across income lines and measurable competence and coverage
- **Prioritize quality measurement and data literacy**
 1. The foundation of health system strengthening lies in quality measurement that is cost-efficient, timely, and transparent
 2. Update country health system toolkits to include vital registries, health system intelligence systems, and targeted studies
 3. Promote health and data literacy
- **Improve quality – four universal actions**
 1. Govern for quality; create a shared vision with a national quality policy strategy and mechanisms for implementation and accountability, developed in partnership with the private, civic, and non-health sectors
 2. Service delivery redesign; reorganize health services to maximize health outcomes rather than solely geographic access
 3. Transform the health workforce; shift towards competency-based clinical education that pairs active learning with supervision and mentorship support and empower the workforce with good working conditions
 4. Ignite the demand for quality; educate the public of their rights to quality health care and employing social mechanisms to inform and empower people to become active patients holding the health system accountable

What civil society and non-governmental organizations can do?

- Demand more from providers and health systems; become informed as to their rights and entitlements in the health system and making use of redress options when care falls below quality standard
- Advocate for change and hold systems to account; maintain the necessity for social accountability within the relationship with government in creating transparent and progressive health standards and reforms

What global bilateral, multilateral and foundation partners can do?

- Invest in national institutions to produce evidence on health system quality; support the training and education of data scientists and help build institutional capability through shared practice
- Support the development of health system quality measures; 1. maintain support of vital registries and health information systems that can inform improvement and accurately capture the status of health systems 2. compose and maintain global repositories of validated comparable measure, instruments and best practices
- Include quality in tracking progress of global initiatives; establish appropriate indicators, particularly in determining coverage and quality measurement
- Channel donor funding to universal actions for improvement; align external funding with country strategies that promote quality improvement over small scale or vertical initiatives
- Fund research on system-wide improvement strategies; 1. promote evaluation of improvement reforms to gauge impact of existing investments and returns, 2. create platforms for regional learning through networks and meetings to promote dissemination of context-specific ideas

What researchers can do?

- Measure quality and evaluate quality improvement; 1. fill in gaps of available quality data and rigorously assess improvement strategies with implementation science methods 2. emphasize and prioritize evidence-based research for scale-up justification

Fast-progressing countries are adopting ENAP's recommended actions

Countries with high mortality levels have been making faster progress to reduce newborn mortality since 2000, that occurred during the 1990s. Of the cohort of 90 countries that completed the Every Newborn tracking tool in 2018, we can highlight 10 countries which have highest burdens of newborn mortality and yet have made considerable progress since 2000.

Within every region there are countries making rapid progress that neighbouring countries can learn from. Between 2000 and 2018, Rwanda reduced its NMR from 39 to 16, and average annual rate of reduction (AARR) of 5.1%. Ethiopia achieved a reduction from NMR 49 in 2000 to NMR 28 in 2018 and Malawi from 39 to 22. Over the same period, Bangladesh reduced

is NMR from 42 to 17 and India from 45 to 23.

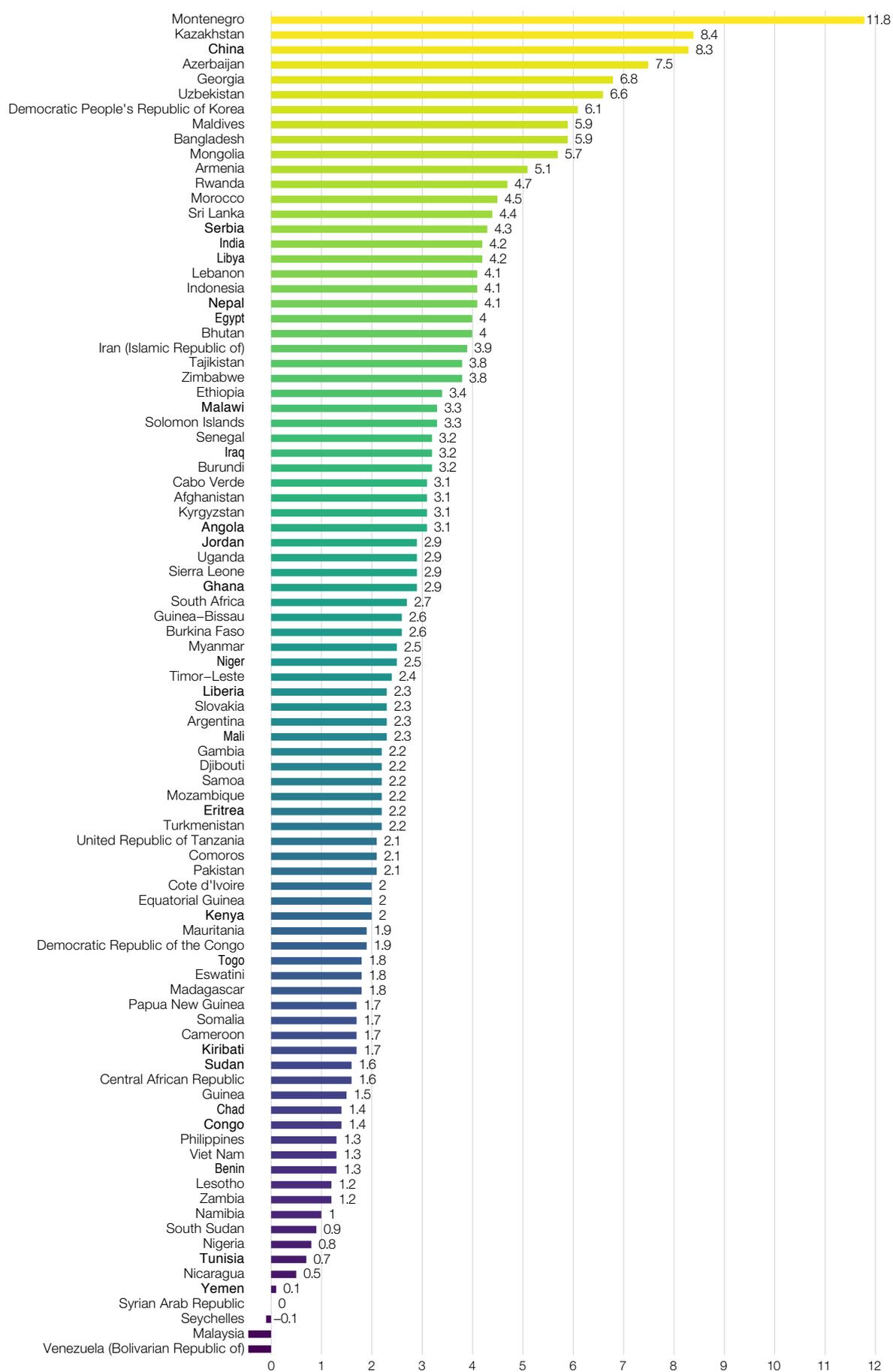
Fig 16 demonstrates the AAR from newborn mortality in the fastest progressing countries between 2010 and 2018. Fast progressing countries report to have scaled-up policies and plans and programmatic responses in support of improved maternal and newborn health outcomes. The ten countries with the current high mortality burden are China, Bangladesh, Rwanda, India, Indonesia, Nepal, Egypt, Zimbabwe, Ethiopia, and Malawi. Using the tracking tool data, we can identify common policy and programmatic priorities that these group of 10 countries are pursuing.

Fig 17/Table 1 captures these findings which depict a higher propensity in the 10 'fast progressing' countries to implement policies and programmes to ensure improved maternal and newborn health outcome. It is evident that this group is moving faster than other high burden countries in adopting a broad range of recommended actions.

Fig 16. Snapshot of policy and programmatic responses in fast progressing high burden countries

Country	Newborn plans/components are costed and budgets for current year	Defined NMR target	Plan Prepared with other sectors	Sub-national plans	New-born health focal point	Defined SBR reduction target	QI guidelines and standards	QI plan	Re-search agenda for newborn health	KMC guidelines	HR Strategy	Gain neonatal nursing competencies	Community mobilization strategy
Bangladesh													
China													
Egypt													
Ethiopia													
India													
Indonesia													
Malawi													
Nepal													
Rwanda													
Zimbabwe													
Total 10 %	80	90	90	70	100	60	90	80	60	60	70	90	80
% of all 90 countries	51	83	79	27	87	32	49	44	39	32	44	62	48

Fig. 17. Country progress to reduce the newborn mortality rate between 2010 and 2018



Annual Rate of Reduction in NMR 2010–2018

Source: Prepared by UNICEF using UN IGME 2018 NMR estimates.



2.2 Intensify effort where the greatest burdens of death and disability occur

An intensive focus is needed to provide quality care in many highest burden settings. Particular focus is needed on services in humanitarian or fragile settings where women, children and particularly newborns are highly vulnerable.

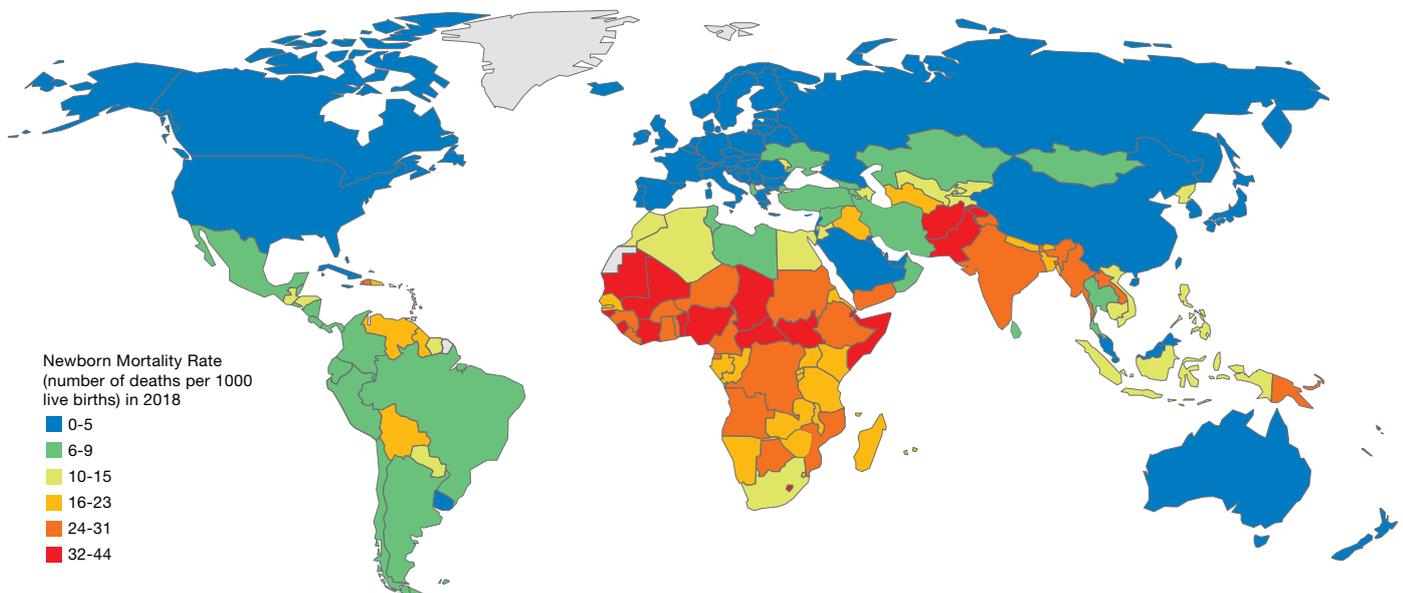
Recent analyses have indicated that roughly 60% of maternal and 45% of newborn deaths occur in countries affected by a humanitarian crisis or fragile conditions. The highest rates of stillbirths occur in conflict and emergency settings (49).

- Four countries currently account for almost 50% of all newborn deaths: The Democratic Republic of the Congo, India, Nigeria and Pakistan.

- 80% of the countries with the highest rates of newborn mortality experience recent or current humanitarian crises (50) (Fig.18).

In addition, critical disparities occur within countries. National level statistics do not show the geographic variations in newborn mortality and stillbirth, and newborn health outcomes that occur at the subnational level in high, middle or low income settings. For example, Demographic Health Surveys in Pakistan and Ghana identify large disparities in the opportunity for survival based on the location of birth. In Pakistan, NMR is 20 in Islamabad, but 63 in Punjab province (53) and in Ghana NMR is 20 in Accra, and 44 in Volta Region (52). Addressing geographic inequality within countries is essential to reducing preventable mortality and achieving better health outcomes for mothers and their children.

Fig. 18. Distribution of newborn mortality rates across the world (2018)



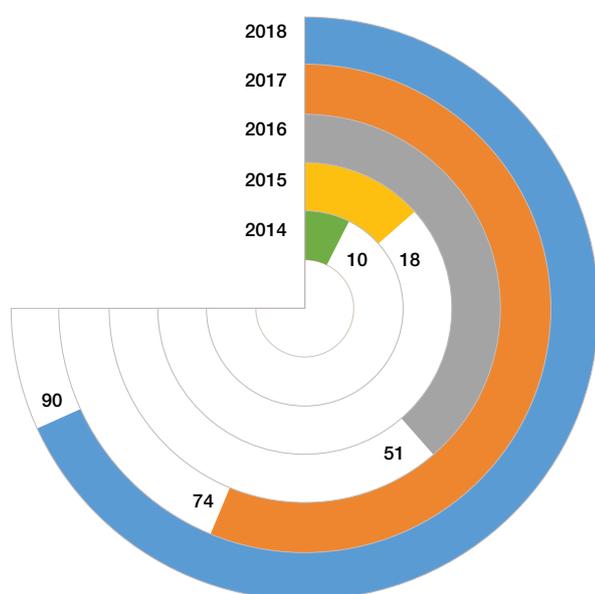
Source: Prepared by UNICEF using UN IGME 2018 NMR estimates.

3. Tracking progress towards Every Newborn 2020 national milestones

The Every Newborn 2020 milestones track country ownership and action. They are fundamental to reaching the targets to end preventable deaths and ensure available, accessible and good quality care. Tracking progress holds all stakeholders accountable to end preventable maternal, newborn and stillbirth deaths.

Country leadership has been critical to drive engagement, action and partners' harmonization efforts towards making the ENAP goals and milestones a reality. This section presents data collated in 2018 from the 90 countries that completed the Every Newborn tracking tool (Fig. 19). It also highlights examples of specific country activity for each national milestone. Examples of national, regional and global efforts in support of country-level progress are highlighted in boxes within the milestone sections.

Fig. 19. Increase in number of countries completing the Every Newborn Tracking Tool between 2014 and 2018



Methodology

The tracking tool was initially developed in 2015 by the Every Newborn management team and includes both quantitative and qualitative information. Its objective is to help countries monitor their progress towards the Every Newborn milestones and identify areas for technical assistance. The first version of the tool was

used in 2015. In 2018 the tool was updated to capture more in-depth information around implementation of specific policies and programmes.

The tracking tool is shared with Ministries of Health through the local UNICEF office. Ministries of health are asked to confirm the status of MNH policies and programmes, noting which are in place, which are in progress and which are not. Qualitative data is also collected to increase understanding of key milestones that have been lagging in previous years, such as including community engagement, research and innovation.

In 2018, a total of 90 countries completed the tool compared to only 18 countries in 2015. These include all Countdown to 2030 countries (Table 3). For this report, additional data on coverage of key interventions and newborn mortality were extracted from UNICEF databases and the United Nations *Interagency Group for Child Mortality Estimation (UN IGME) report and 2019 (54, 55).*

The data were compared for two sets of countries: the total 90 countries that completed the **2018 Every Newborn Tracking Tool** (Table 3) and a subset comprising the 34 countries with the highest burden of child mortality as defined by UNIGME in 2018 (Table 4). Progress on selected indicators was also measured over time, using past data since 2014. To better understand coverage and performance, composite indicators were developed using existing indicators.

To supplement the quantitative data and develop a more profound understanding of gaps, barriers and progress, a thematic analysis was conducted in two rounds using the tracking tool database.

Challenges and constraints

While 90 countries reported using the tool, there were some issues with data completeness. First, while some indicators received a 100% response rate, there were indicators that a number of country representatives omitted or were unable to provide. Data completeness issues may have hampered the statistical significance of results in some cases. To rectify this, a response rate measure was developed that measured indicator completeness.

Only those indicators representing data from 60% or more countries are presented in this report. Second, issues with validity were also a constraint in the analysis. UNICEF country and regional offices were approached

to verify information. This learning will be incorporated into subsequent use of the tool.

Country data set

This report presents a compilation of the data on country progress for each of the Every Newborn milestones. It also highlights country activity, regional and global progress in support of goals.

The 90 countries and territories that completed the tracking tool in 2018 are shown in alphabetical order in Table 3. ENAP specified the need to support progress in those countries with 80% of the newborn mortality burden. Therefore, this report has a special focus on countries with the highest burden of newborn mortality and stillbirths (Table 4) and highlighted in bold in Table 3.

Table 3. Countries and territories that completed the tracking tool in 2018

Afghanistan	Egypt	Malawi	Slovakia
Angola	Equatorial Guinea	Malaysia	Solomon Islands
Argentina	Eritrea	Maldives	Somalia
Armenia	Eswatini	Mali	South Africa
Azerbaijan	Ethiopia	Mauritania	South Sudan
Bangladesh	Gambia	Mongolia	Sri Lanka
Benin	Georgia	Montenegro	Sudan
Bhutan	Ghana	Morocco	Syrian Arab Republic
Burkina Faso	Guinea	Mozambique	Tajikistan
Burundi	Guinea-Bissau	Myanmar	Timor-Leste
Cabo Verde	India	Namibia	Togo
Cameroon	Indonesia	Nepal	Tunisia
Central African Republic	Iran (Islamic Republic of)	Nicaragua	Turkmenistan
Chad	Iraq	Niger	Uganda
China	Jordan	Nigeria	United Republic of Tanzania
Comoros	Kazakhstan	Pakistan	Uzbekistan
Congo	Kenya	Papua New Guinea	Venezuela (Bolivarian Republic of)
Côte d'Ivoire	Kiribati	Philippines	Viet Nam
Democratic People's Republic of Korea	Kyrgyzstan	Rwanda	Yemen
Democratic Republic of the Congo	Lebanon	Samoa	Zambia
Djibouti	Lesotho	Senegal	Zimbabwe
	Liberia	Serbia	
	Libya	Seychelles	
	Madagascar	Sierra Leone	

Table 4. Countries ranked by burden of newborn mortality and stillbirths

Criteria	Country (listed by magnitude of mortality, highest to lowest)
Top 20 countries with the highest number of newborn deaths	India (1), Nigeria (2), Pakistan (3), Democratic Republic of the Congo (4), Ethiopia (5), China (6), Indonesia (7), Bangladesh (8), United Republic of Tanzania (9), Afghanistan (10), Sudan (11), Uganda (12), Angola (13), Philippines (14), Kenya (15), Mozambique (16), Côte d'Ivoire (17), Egypt (18), Mali (19), Niger (20).
Top 20 countries with highest newborn mortality rates	Pakistan (1), Central African Republic (2), South Sudan (3), Somalia (4), Afghanistan (5), Guinea-Bissau (6), Nigeria (7), Lesotho (8), Côte d'Ivoire (9), Chad (10), Mali (11), Mauritania (12), Sierra Leone (13), Djibouti (14), Comoros (15), Benin (16), Equatorial Guinea (17), Sudan (18), Mozambique (19), Democratic Republic of the Congo (20)
Top 20 countries with highest estimated stillbirth rate	Pakistan (1), Nigeria (2), Chad (3), Niger (4), Guinea-Bissau (5), Somalia (6), Djibouti (7), Central African Republic (8), Togo (9), Mali (10), Comoros (11), Benin (12), South Sudan (13), Ethiopia (14), Yemen (15), Democratic Republic of the Congo (16), Angola (17), Mauritania (18), Afghanistan (19) and Côte d'Ivoire (20).

Sources: UNIGME (2019) (55) and Blencowe et al (2016) (56).



PROGRESS TOWARDS EACH EVERY NEWBORN MILESTONE



Milestone 1: National plans

Review and sharpen national strategies, policies and guidelines for reproductive, maternal, newborn, child and adolescent health (RMNCAH) in line with the goals, targets and indicators in ENAP, including a clear focus on care around the time of birth and on small or sick newborns.

87% of the countries have completed a newborn action plan or updated the maternal and newborn component in the RMNCAH strategy/plan

- 46% costed and budgeted MNH plans
- 27% prepared subnational MNH plans
- 62% included civil society input in the development of the MNH plan

Defining a newborn mortality reduction target is now a norm, but defining a stillbirth target is not

- 81% of countries defined a target for newborn mortality reduction
- 32% of countries defined
- Very few countries that updated their MNH plans in the past 2 years defined a stillbirth reduction target

In 2017, only 17 countries had set a stillbirth reduction target, while in 2018 this increased to 29 countries: Bangladesh, Bhutan, Cabo Verde, Cameroon, Democratic People's Republic of Korea, Ethiopia, Guinea-Bissau, India, Indonesia, Iraq, Islamic Republic of Iran, Kyrgyzstan, Lesotho, Libya, Madagascar, Malawi, Malaysia, Maldives, Namibia, Nepal, Nigeria, Puerto Rico, Sierra Leone, South Sudan, Sri Lanka, Sudan, Tunisia, Uganda and the United Republic of Tanzania.

Of 2.6 million global stillbirths each year, 98% occur in sub-Saharan Africa and Asia (57). Half of stillbirths – 1.3 million – are babies who begin labour alive and die before birth (intrapartum stillbirth). Progress to reduce these largely preventable deaths has been slow. A first step is to define a stillbirth reduction target. While MNH is receiving increasing investment leading to substantial health gains, stillbirths are not completely integrated into this agenda.

Progress in the 34 countries with the highest burden of mortality

Of the highest burden cohort of 34 countries, 32 countries have developed a newborn action plan or updated the newborn component of existing plans. Despite this fact and based on the responses to the

2018 Tracking Tool, a large number of these high-burden countries have not undertaken the necessary planning and investments to implement their plan.

See Table 5 for the status of newborn mortality and stillbirths in countries with the highest burden (the 34 countries with the highest SBR, NMR and incidence of newborn death).

During 2017 and 2018, 14 of the 34 countries identified with the highest newborn mortality burden finalized newborn health plans, and 13 countries defined a newborn mortality reduction target: Benin, Central African Republic, Chad, Côte D'Ivoire, Democratic Republic of Congo, Lesotho, Mali, Mauritania, Niger, Sierra Leone, South Sudan, Togo and Yemen.

19/20 countries with the highest number of newborn deaths have developed newborn plans or strengthened the newborn component of existing plans, and 18 have defined newborn mortality reduction targets



Three of the four countries (Democratic Republic of the Congo, India, Nigeria and Pakistan) that account almost 50% of newborn mortality have developed newborn plans or strengthened the newborn component of existing plans.

- The fourth, Pakistan, which functions with a decentralized health system, has a provincial plan being implemented in Punjab since 2015 and is in the process of developing similar plans for further provinces.



90% of the countries with the highest rates of newborn death prepared a newborn action plan or strengthened the newborn component of their RMNCAH plan and defined a newborn mortality reduction target.

- Between 2017-2018, nine of the 20 countries with the highest newborn mortality rates finalized their plan: Benin, Central African Republic, Chad, Côte D'Ivoire, Democratic Republic of Congo, Lesotho, Mali, South Sudan and Sierra Leone.
- All nine countries defined newborn mortality reduction targets; however, only three defined stillbirth reduction targets (Lesotho, Sierra Leone and South Sudan).

Table 5. Progress with developing MNH plans and defining mortality reduction targets in the 34 countries with the highest burden of mortality

Highest burden countries	NMR in 2013	NMR in 2018	Number of newborn deaths 2018 (000s)	Highest 20 stillbirth rates (2015 ranking)	National newborn action plan	Strengthened newborn component in RMNCAH strategy or plan	Newborn component in emergency preparedness plan	Defined newborn mortality reduction targets	Defined stillbirth rate reduction target
India	28.4	23	549	23	2014				
Nigeria*	35.6	36	267	42.9 (2)	2016				
Pakistan*	48.4	42	251	43 (1)	2015 to present				
Democratic Republic of the Congo*	31	28	98	27.3 (16)	2018				
Ethiopia*	33.1	28	99	29.7 (14)	2015				
China	6.5	4	73	7.2	2018				
Indonesia	14.3	13	62	13.2	2014				
Bangladesh	23.1	17	50	25.4	2015				
United Republic of Tanzania	23.1	21	44	22.4	2016				
Afghanistan*	44	37	45	26.7 (19)	2016				
Sudan	31.6	29	38	24.4	2016				
Uganda	23.1	20	32	21	2016				
Angola	32.7	28	36	27.3 (17)					
Philippines	14.3	14	30	10.9	2016				
Kenya	22.6	20	29	22.5	2016				
Mozambique	29.4	29	31	19.1					
Côte d'Ivoire*	35.9	34	30	26.7 (20)	2018				
Egypt	13.5	11	29	12.2					
Mali*	38.3	33	26	32.5 (10)	2018				
Niger	29	25	26	36.7 (4)	-				
Somalia*	46	38	24	35.5 (6)	-				
Central African Republic*	44.6	41	7	34.4 (8)	-				
South Sudan*	40	40	15	30 (13)	2018				
Lesotho*	40.3	35	2	19.5		2018			
Guinea-Bissau*	41	37	2	36.7 (5)	2016				
Chad*	37	34	22	39.9 (3)	2018				
Mauritania*	36.7	33	5	27.1 (18)					
Sierra Leone*	37.7	33	8	24.4	2018				
Benin*	34	31	13	30.3 (12)		2018			
Djibouti*	35.4	32	1	34.6 (7)	2015				
Comoros*	34.7	32	1	30.5 (11)	2016				
Equatorial Guinea	33.3	30	1	16.2	2016				
Togo	27.3	25	6	34.2 (9)	2018				
Yemen	27	27	23	29 (15)	2017				

NMR: neonatal mortality rate; RMNCAH: reproductive, maternal, newborn, child and adolescent health.

Sources: United Nations Inter-Agency Group for Child Mortality Estimation (UN IGME) (58).

■ Highest newborn mortality ■ Countries with highest newborn mortality rates ■ Additional countries with highest stillbirth rates

SPOTLIGHT: India's Newborn Action Plan

The India Newborn Action Plan (INAP) was launched in September 2014 to accelerate the reduction of preventable newborn deaths and stillbirths, with the goal of attaining a “single digit NMR by 2030”. At the launch, the Indian Ministry of Health and Family Welfare declared that:

INAP is India's renewed commitment to ending preventable stillbirths and newborn deaths. With a clear understanding that almost all of these deaths and subsequent disabilities are preventable, the plan is a concerted effort towards translating these commitments into meaningful change for newborns.

Implementation of INAP has seen a reduction in the national NMR from 28 per 1000 live births in 2013 to 23 in 2018. Building on existing commitments under India's National Health Mission and Call to Action for Child Survival and Development, INAP has the following key features.

1. A focus on ending preventable newborn deaths, improving quality of care and care beyond survival, prioritizing babies that are born too soon, too small or sick as they account for the majority of all newborn deaths.

- Six pillars of intervention have been implemented: preconception and antenatal care; care during labour and childbirth; immediate newborn care; care of the healthy newborn; care of the small and sick newborn; and care beyond newborn survival.
- New guidelines have been prepared on home-based newborn care, scaling-up facility-based training, lactation management centres, family participatory care, universal eye screening including retinopathy of prematurity, use of antenatal corticosteroids and sepsis management.
- Resource documents prepared for parents and families to harness the potential of the first 1000 days.
- LaQshya, the flagship programme bringing together national quality assurance standards and quality improvement approaches, has been launched nationwide for improved quality of care around birth and respectful maternity care in district and subdistrict level public health facilities.
- A Policy decision has been taken to roll out midwifery services in the country in 2018. Guidelines on *Midwifery Services in India* were released, focusing on the education and training of nurse practitioners in midwifery.

2. INAP aspires towards ensuring equitable progress for girls and boys, rural and urban, rich and poor, and between districts and states.

- Four states – Uttar Pradesh, Bihar, Madhya Pradesh and Rajasthan – accounted for 57% of all neonatal deaths in India.
- Bottleneck analyses were undertaken to identify the key causes of mortality. 117 underperforming districts across the country were identified as ‘aspirational districts’ and prioritized for multidimensional and holistic development including maternal, newborn health and nutrition.

3. INAP emphasizes a strengthened surveillance mechanism for tracking stillbirths.

- National guidelines for a hospital-based birth defect surveillance system and a stillbirth surveillance system have been developed.
- Fifty-five institutions identified in surveillance information units have reported on birth defects.

A mid-course review in 2017 found that newborn action plans had been incorporated in all state-level plans. Progress on core indicators in all states and districts is being reported and reviewed using a sample registration system, HMIS and periodic surveys (the latest being the National Family Health Survey 4, 2015-2016). Gender-disaggregated data for care provided to sick and small newborns is available through an online database (www.sncuindiaonline.org).

One national and four regional collaborating centres have been established to provide mentoring support for those caring for newborns and to serve as knowledge management units. Ten states are in different phases of establishing resource centres to enhance local capacities. INAP is due to be reviewed and updated in 2020. Table 6 depicts the India Newborn Action Plan Milestones (2014-2020).

Table 6. India's Newborn Action Plan Milestones (2014-2020)

Year	National Milestones
2014	National launch - India Newborn Action Plan
2015-2016	<ul style="list-style-type: none"> • State Newborn Action Plans indicators • Reporting by states on Dashboard Indicators • Quality assurance mechanism established for research and knowledge management • Gender disaggregated data available and monitored for various interventions
2017	Mid-course review
2015-2016	<ul style="list-style-type: none"> • Stillbirth tracking mechanism strengthened • Accountability framework developed and operationalised at all levels of health care • Equity disaggregated data available and monitored for all interventions
2020	Review and update action plan



Newborn Health in Humanitarian and Fragile Settings

Over the past decade, humanitarian crises have been increasing in number and duration. Between 2005 and 2017, the number of crises receiving an internationally-led response almost doubled from 16 to 30 (59). Of the 20 countries with the highest NMR, 16 have experienced recent humanitarian crises, conflict or political instability deemed as acute humanitarian emergencies or protracted humanitarian crises.

Countries with the highest number of such complex emergencies:

- With the highest number of newborn deaths between 2014-2017, were Afghanistan, the Central African Republic, Pakistan, Somalia and South Sudan.

- With the highest number of stillbirths in 2015, were Chad, Niger, Nigeria, Pakistan and Somalia.

In such settings, pregnant women and newborns are vulnerable and at increased risk of poor health outcomes; however, due to a lack of quality data the true global burden is unknown. It is known that newborn health services are often neglected during humanitarian crises and, until recently, newborns were largely missing from emergency preparedness planning, response assessments, provision of supply kits and intervention packages, and monitoring efforts that are traditionally deployed during crisis responses.

Caring for women and newborns at this crucial time remains a challenge. As a first step, ensuring that maternal and newborn health care is included in emergency preparedness planning is essential.

42% of countries have reported to have included emergency preparedness for newborn care in their national plan

Angola, Argentina, Armenia, Benin, Bhutan, Burundi, Central African Republic, Comoros, Equatorial Guinea, Georgia, India, Iran (Islamic Republic of), Iraq, Lebanon, Lesotho, Libya, Malaysia, Maldives, Mali, Mongolia, Morocco, Nepal, Occupied Territory of Palestine, Rwanda, Senegal, Sierra Leone, Slovakia, Solomon Islands, South Africa, South Sudan, Sri Lanka, Sudan, Timor-Leste, Togo, Yemen, Zambia and Zimbabwe.

Of those countries that have acute or protracted humanitarian crises, less than half reported to have included a newborn component in national emergency preparedness planning

Chad, the Democratic Republic of the Congo, Djibouti, Guinea-Bissau, Mauritania and Niger recently finalized a newborn action plan or strengthened the newborn component of existing plans (Table 7). It will be a missed opportunity if newborn health is not aligned with emergency preparedness planning at the national level. Given the particular vulnerability of pregnant women and newborns during humanitarian crises, this must be a top priority for countries and the global health community.



Table 7. Newborn care component in national emergency preparedness plans

Country	Newborn mortality rate (2018)	Newborn action plan or strengthened MNH component in other plans	Newborn component in the emergency preparedness plan
1. Pakistan	42		
2. Central African Republic	41		
3. South Sudan	40		
4. Afghanistan	37		
5. Somalia	38		
6. Lesotho	35		
7. Guinea-Bissau	37		
8. Mali	33		
9. Chad	34		
10. Côte d'Ivoire	34		
11. Mauritania	33		
12. Sierra Leone	33		
13. Nigeria	36		
14. Benin	31		
15. Comoros	32		
16. Djibouti	32		
17. Democratic Republic of the Congo	28		
18. Yemen	27		

MNH: maternal and newborn health

Sources: World Bank, *Harmonized list of fragile situations 2018*; United Nations Interagency Group for Child Mortality Estimation. *Estimates for NMR in 2019 (adapted to include the Democratic Republic of the Congo, Sudan and Yemen) (60)*.



SPOTLIGHT: Iraq's humanitarian and development programmes

After more than a decade of conflict and subsequent humanitarian crisis, Iraq is entering a critical phase of reconstruction including re-establishing basic services, especially in areas severely affected by conflict. The population of Iraq is estimated to be 38 million with 30% living in rural settings. In October 2018, an estimated 1.8 million internally displaced persons (IDPs) were residing in camps, and a further 1.3 million were estimated to be outside camps. Of 18 governorates in Iraq, some have been severely affected by the conflict and represent hotspots from a humanitarian perspective (Ninevah, Anbar and Salahuddin). The vast majority of IDPs are now settled in the north-central region of Iraq (Kurdistan).

Since 2015, the Government of Iraq has committed to improving newborn health care throughout the country; this includes addressing care within humanitarian contexts to maintain adequate responses in conflict-affected areas. UNICEF has supported the Ministry of Health with direct technical and financial support, in addition to continuous collaborative coordination with all stakeholders including WHO and the United Nations Population Fund (UNFPA).

The Government of Iraq has developed the Iraq ENAP 2016-2020 (IENAP). This provides a road map to reduce preventable newborn deaths and stillbirths, at a time when conflict and displacement have overwhelmed the health system and jeopardized services. National surveys and assessments highlight significant challenges throughout the population when trying to access a comprehensive package of care or services; vulnerable groups such as newborns and women are particularly affected.

The Iraq ENAP initially considered targeting 10 governorates identified as highly-vulnerable areas. Key activities implemented in both conflict-affected and non-affected areas included: capacity-building for staff working in MNH care facilities, capacity-building in counselling during antenatal care and postnatal care visits, and equipping newborn care units and delivery rooms in MNH care facilities.

These activities support service provision in 40 MNH care facilities located in the 10 governorates. Five were either directly affected by the conflict (Mosul and Al-Anbar) or indirectly affected by the influx of IDPs (Duhok, Kirkuk and Erbil).

A nationwide survey conducted in 2018 (MIC, Multiple Indicator Cluster Survey 6) revealed remarkable improvements in MNH care indicators, with the national NMR falling from 20 per 1000 live births in MICS 2011 – the national baseline for the Iraq ENAP target – to 14 per 1000 in MICS 2018. The NMR reductions were most evident in the 10 governorates supported directly by high-impact interventions and targeted interventions for highly-vulnerable populations at district level including conflict-affected areas.

The experience provides a number of key lessons. First, efficient use of financial resources is essential for success. More than 95% of funds are raised and allocated for humanitarian needs, with the result that services in areas not directly affected by conflict fall behind; quality of care and service delivery are severely affected when both humanitarian and development objectives are not included in the implementation processes.

Second, some developmental activities such as quality improvement which specifically requires “settled” environments, can be implemented at a low scale in post-conflict areas during times of service revitalization. Third, close coordination and collaboration between stakeholders working in both humanitarian and developmental settings results in better outcomes for both settings.

Global support to address maternal and newborn health in crises and fragile settings

The Every Newborn Results Framework 2017-2018 the following activities to intensify efforts in humanitarian settings.

1. Finalization and dissemination of the *Newborn Health in Humanitarian Settings: Field Guide* by Save the Children and UNICEF (61).
2. Preparing Newborn Supply Kits from the UNICEF Supply Division in collaboration with partners.
3. Supporting countries to add a newborn component in emergency preparedness plans.

Moving forward to 2020 and beyond, the urgent need for MNH in humanitarian settings requires accelerated action:

- Despite the global burden of neonatal morbidity, mortality and stillbirths in humanitarian settings, research investments are currently insufficient and not enough is known about the epidemiology or best practices for neonatal survival in humanitarian settings and research investments to this end are currently insufficient. In addition, there is a lack of global vision, strategy and commitment to scale-up newborn interventions in populations affected by violence, acute and protracted conflict and disasters. To address knowledge gaps, in 2018, WHO convened development and humanitarian partners to set research priorities for maternal and newborn health in humanitarian settings, and to reach an agreement on the set of MNH indicators to be used during humanitarian crises.
- Under the umbrella platform of EWEC, ENAP and other supporting initiatives, and supported by Her Royal Highness Princess Sarah Zeid of Jordan; Save the Children, UNHCR, UNICEF and WHO convened partners from dozens of key agencies to develop a multisectoral *Five-year road map to accelerate progress on newborn health in humanitarian settings 2020-2025* (62).

The Roadmap to Accelerate Progress for Every Newborn in Humanitarian Settings (2020-2025) sets out targets and plans to support countries to:

1. Prioritize strengthening the maternal-newborn dyad in humanitarian crises.
2. Ensure delivery of cost-effective, lifesaving essential newborn care from the onset of an emergency.
3. Expand universal access to dignified and quality antenatal, intrapartum, and postnatal interventions along the continuum of care.
4. Deliver appropriate care for small and sick newborns.
5. Register every birth and count every newborn death and stillbirth.
6. Strengthen linkages across the continuum of care with key humanitarian sectors.
7. Generate support and coordination across the humanitarian-development nexus.
8. Empower communities and government through partnerships that promote innovative and sustainable maternal and newborn health services.
9. Explore innovative approaches and improve scientific evidence that informs service delivery at the facility and community level.
10. Increase the visibility of newborns in humanitarian settings using existing accountability frameworks.

In addition, an advocacy plan was developed in collaboration with IAWG (63). This articulates the burden of maternal and newborn death and disability, and stillbirths, in these settings; programmatic opportunities and constraints; and advocacy messages to gather support from donors, global partnerships and the development community.

Designed and vetted by a wide range of stakeholders, including clinicians, implementers, academics, policy-makers, government representatives, donors, private sector representatives, and professional associations across the RMNCAH&N continuum, the advocacy plan calls for collective and accountable action. It emphasizes the need to engage stakeholders from across humanitarian and development sectors to ensure that newborns survive and thrive even in the most difficult circumstances, thereby increasing the potential of meeting the SDGs.

This five-year road map was shared at Women Deliver in 2019 and will be launched at the time of the United Nations General Assembly in 2019. All materials can be found at <https://www.healthynewbornnetwork.org/issue/emergencies/>



Milestone 2: Quality care

Adopt standards of quality and indicators for assessing quality of maternal and newborn care at all levels of the health system; and ensure access to essential commodities for RMNCAH.

“High-quality health systems could prevent 1 million newborn deaths and half of all maternal deaths each year” concluded the Lancet Global Health Commission in 2018 (64). As countries expand their health systems towards achieving UHC, both access to care and quality of care will be critical to ending preventable maternal, newborn and child deaths by 2030, in line with SDGs targets.

Achieving UHC will require the removal of financial barriers to care-seeking and provision, while simultaneously expanding the coverage and quality of that care. Quality care improvement planning requires many activities including: ensuring the availability of essential medicines and commodities; compliance with evidence-based clinical interventions and practice; an adequate hygiene infrastructure; competent and motivated staff; documentation and use of information.



Less than half of countries have adopted guidelines and standards and developed national plans for quality care improvement for maternal and newborn health

- 44% of all countries report having implementation standards or guidelines for quality improvement, and 49% report having specific guidelines for MNH;
- 42% have a plan to implement quality of care guidelines and standards.

Progress in developing policies to support quality maternal and newborn care in the 34 highest burden countries



90% of countries with the largest numbers of newborn deaths have adopted quality of care guidelines

- Most countries report that they are implementing these guidelines: Afghanistan, Bangladesh, China, Côte d'Ivoire, Democratic Republic of the Congo, Egypt, Ethiopia, India, Indonesia, Kenya, Mozambique, Niger, Nigeria, Pakistan, Sudan, Uganda and the United Republic of Tanzania.



45% of countries with the highest rates of newborn mortality have adopted quality of care guidelines

- Seven of the 20 countries with the highest NMRs (Afghanistan, Benin, Chad, Central African Republic, Democratic Republic of the Congo, Mali, Sudan) have adopted quality improvement guidelines. This work is reported to be in progress in five further countries; Côte d'Ivoire, Guinea-Bissau, Nigeria, Pakistan and Sierra Leone.
- Only four of the seven countries have developed a plan to implement these guidelines.
- Implementation will require a range of supporting policies to achieve progress (Table 8). Planning and investment will be needed to deliver the supporting policies including in postnatal care, maternal and perinatal death surveillance and response systems, human resource planning and WASH.

Table 8 is a snapshot of quality of care plans and guidelines in the 34 highest burden countries and shows progress with ensuring that accompanying policies are in place to support the implementation of quality improvement plans. Pathfinder countries in the Quality of Care Network (65) demonstrate clear progress adopting and implementing the necessary standards and guidelines, as well as ensuring that the accompanying policies required to deliver quality of care are also in place, such as essential medicines, maternal and perinatal death surveillance and review (MPDSR), human resource planning, postnatal care, KMC guidelines and WASH in facilities.

Table 8. Country progress in delivering quality of care for newborns

Cohort of 34 Highest burden countries	National quality improvement Guidelines MNH	National implementation standards/ guidelines for quality improvement	Plan for implementing the quality of care guidelines and standards	Updated policy/guideline on KMC	Updated policy/guideline on postnatal care	Maternal death surveillance and response system in place	Perinatal death review system in place	Human resource plan or strategy for SBA	Number of essential commodities on the NEML (of 8)	Water: basic services (%)	Water: no service (%)
India									8/8		9
Nigeria									8/8	50	36
Pakistan									8/8		-
Democratic Republic of the Congo									8/8		49
Ethiopia									6/8	30	30
China									7/8	91	9
Indonesia									7/8	80	13
Bangladesh									8/8	70	16
United Republic of Tanzania									6/8		22
Afghanistan									8/8		
Sudan									8/8	-	-
Uganda									8/8		4
Angola									7/8		
Philippines									5/8		20
Kenya									8/8	66	17
Mozambique									7/8		20
Côte d'Ivoire									7/8	-	14
Egypt									7/8		
Mali									7/8	57	11
Niger									7/8	-	39
Somalia									8/8		22
Central African Republic									6/8	-	-
South Sudan									7/8	-	36
Lesotho									7/8	57	4
Guinea-Bissau									8/8		8
Chad									8/8	-	39
Mauritania									6/8	81	11
Sierra Leone									8/8		23
Benin									8/8		26
Djibouti									8/8		18
Comoros									8/8	21	61
Equatorial Guinea									8/8		
Togo									8/8	58	13
Yemen									8/8		

KMC: kangaroo mother care; NEML: National Essential Medicines List; SBA: skilled birth attendant

Sources: WASH data source JMR UNICEF and WHO (66).

Box 5. Quality maternal and newborn care demands water and sanitation services

Clean water for childbirth and newborn care is essential and yet in many high-burden countries more than a quarter of facilities have no water supply. Provision of water, sanitation and hygiene (WASH) in health facilities is a prerequisite for quality care; it is particularly important for the safe management of childbirth and prevention of neonatal infection. More than 1 million deaths each year are associated with unclean births. Infections account for 26% of neonatal deaths and 11% of maternal mortality (67).

In March 2018, the United Nations Secretary-General issued a global call for greater leadership and accountability to provide WASH services in all health-care facilities, emphasizing the high cost of inaction.

In April 2019, the UNICEF and WHO Joint Monitoring Framework published a new report, *Water, sanitation, and hygiene in health care facilities: practical steps to achieve universal access for quality care*, to establish a baseline for water, sanitation, hygiene and waste disposal services in health facilities (68).

At the World Health Assembly in 2019, Resolution A72/72 on Patient Safety, Water, sanitation and hygiene in health care facilities was agreed by all Member State of WHO adopt measures to ensure the improved coverage and quality of WASH in all health care facilities (69).



SPOTLIGHT: Quality of Care Network countries progress with implementing quality of care milestones

The Network for Improving Quality of Care for Maternal, Newborn and Child Health (known as the Quality of Care Network) was formed in 2016 and works to ensure that every pregnant woman, newborn and child receives good quality care throughout their life along the continuum of care.

The Quality of Care Network is supporting a group of pathfinder countries to learn about how health systems can be strengthened so that efforts to improve quality of care can be effectively implemented, sustained and scaled-up through government systems. Current progress with achieving implementation milestones is set out in Fig. 21. for 10 pathfinder countries in the Quality of Care Network.

Countries are taking different approaches at district and facility level to improve the quality of maternal, newborn and child health (MNCH) care. They are also using different quality interventions and methods to support the use of these interventions.

At the second meeting of the pathfinder countries in Addis Ababa, countries agreed that whatever the approach employed, five systems are required to transform quality of care in health facilities. The first two systems primarily function to build the knowledge, skills and motivation of front-line workers to improve quality of care. The other three systems improve governance, management and community engagement in quality improvement. These are shown in Fig. 20.

Based on the experiences of the 10 pathfinder countries, WHO is developing guidance on how the five systems can be strengthened at national and district level to support efforts to improve quality of care at the facility level.

Fig. 20. Five systems to improve quality of care at facility level

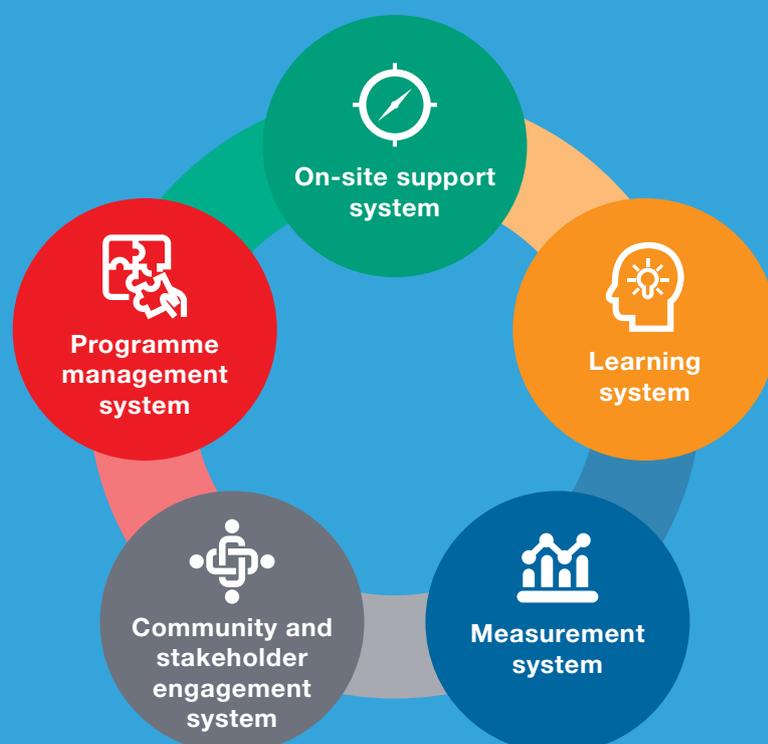


Fig. 21. Quality of Care Network Countries Progress in achieving quality of care implementation milestones (March 2019)

Implementation Milestones										
	Key: ● completed ● in progress ● not started or incomplete ● no data									
National leadership for quality of care (QoC)	Bangladesh	Côte d'Ivoire	Ethiopia	Ghana	India	Malawi	Nigeria	Sierra Leone	Tanzania	Uganda
Supportive governance policy and structures developed or established	●	●	●	●	●	●	●	●	●	●
QoC for maternal and newborn health (MNH) roadmap developed and being implemented	●	●	●	●	●	●	●	●	●	●
Learning districts and facilities selected and agreed upon	●	●	●	●	●	●	●	●	●	●
QoC implementation package developed	●	●	●	●	●	●	●	●	●	●
Adaptation of MNH QoC standards	●	●	●	●	●	●	●	●	●	●
Action: Learning sites identified and prepared										
Orientation of learning districts and facilities	●	●	●	●	●	●	●	●	●	●
District learning network established and functional (reports of visits)	●	●	●	●	●	●	●	●	●	●
QoC coaching manuals developed	●	●	●	●	●	●	●	●	●	●
Quality improvement (QI) coaches trained	●	●	●	●	●	●	●	●	●	●
On-site coaching visits occurring in learning districts	●	●	●	●	●	●	●	●	●	●
Learning and accountability: QoC MNH measurement										
QoC for MNH baseline assessment completed	●	●	●	●	●	●	●	●	●	●
Common set of MNH QoC indicators agreed upon for reporting from the learning districts	●	●	●	●	●	●	●	●	●	●
Baseline data for MNH QoC common indicators collected	●	●	●	●	●	●	●	●	●	●
Common indicator data collected, used in district learning meetings, and reported upwards	●	●	●	●	●	●	●	●	●	●
Identification and agreement with an academic or research institution to facilitate documentation of lessons learned in the implementation of QoC activities	●	●	●	●	●	●	●	●	●	●
Accountability and community engagement										
Mechanism for community participation integrated into QoC planning in learning districts	●	●	●	●	●	●	●	●	●	●

MNH: maternal and newborn health; QoC: quality of care

SPOTLIGHT: UN H6 regional level partnership for quality of maternal and newborn health in south Asia

The UN H6 is made up of the six United Nations agencies working in health (WHO, UNICEF, UNFPA, UNAIDS, the World Bank and UN Women) and is currently active in 27 countries. It convenes to provide technical support, promote coordinated action, and advocate for evidence-based programmes and policies in its engagement and collaboration with governments and other organizations committed to RMNCAH (70).

In the WHO South-East Asia Region, the UN H6 has been working to identify areas that require joint action since 2016. Improving the quality of MNH has been chosen as a priority area and selected countries prioritized for technical support, with the objective of institutionalizing quality improvements in health facilities with a focus on labour, delivery and neonatal care.

Building on a quality-of-MNH-care workshop in 2016, further regional workshops were held to advocate for, and introduce, the concept of quality of care and quality improvement. UNICEF Regional Office for South Asia and the WHO South-East Asia Region jointly contracted a resource centre, University Research Centre (URC), to undertake complementary activities.

This included providing technical support to countries to introduce and institutionalize quality improvement in health facilities; for instance, developing a training package, training of trainers, on-site coaching and mentoring, as well as webinars with country teams, and rolling out the *Point of Care Quality Improvement* approach. Country missions collaborated to monitor implementation and provide on-site technical support.

Through joint efforts, the partnership established a regional programme for improving quality of care for mothers and newborns. Bangladesh, as one of the Quality of Care Network countries, identified demonstration sites in line with the network's plan of action, established quality improvement systems in UNICEF-supported demonstration hospitals, and is currently working on scaling-up to other districts.

Bhutan, Nepal, Pakistan and Sri Lanka have been supported by URC, WHO and UNICEF. Work will continue to strengthen partnerships within the region to scale-up MNH quality improvement interventions in all countries including Afghanistan and Pakistan, and neighbouring countries in the WHO Eastern Mediterranean Region.



SPOTLIGHT: Ensuring coverage and quality of postnatal care in India

WHO's *Postnatal care guidelines* (2013) (71) promote at least four postnatal check-ups for all mothers and newborns in the first six weeks after birth. India initiated the world's most ambitious postnatal home visitation programme by enlisting approximately a million community health workers (ASHAs), to provide six to seven postnatal home visits for each of the 25 million births per year on the subcontinent.

However, a 2017 review of progress supported by the United States Agency for International Development's (USAID) flagship Maternal and Child Survival Program (MCSP) revealed that mothers and babies do not receive the proposed six home visits by ASHAs and the quality of these visits was generally poor. ASHAs were unable to recognize danger signs requiring immediate referral during the postnatal period. The review also found that facility-based pre-discharge postnatal care and community-based home visitations often occurred in silos without mechanisms to ensure interlinkage and synergies in care across professional teams.

As a result of these findings, the Government of the State of Odisha built on its existing antenatal risk-stratification approach, extending it to the postnatal period. Supported by MCSP, a new initiative was set up in Odisha's Nuapada District to identify opportunities to improve the postnatal care gaps. High-risk mothers and newborns received postnatal care from skilled health providers during pre-discharge stays in the facility. Mobile messages linked them with ASHAs who were reoriented to the importance of coverage and the quality of postnatal care.

Monitoring data tracked by the Odisha State government has shown an increase in mean duration of stay at facilities by mothers and newborns. Additionally, the quality and average number of home visits conducted by ASHAs to "high-risk" mothers and newborns, has also increased (from 4.8 to 5.6 visits). More than 80% of mothers and newborns were linked to their respective ASHAs. So far, around half of the high-risk cases have received joint visits by ASHAs and nurse-midwives, indicating a higher quality of care.

A "blanket" approach of six home visits for each of the 25 million births in India every year by around a million front-line workers has proved to be unachievable. The risk-stratification approach is innovative, pragmatic and prioritization-based with huge potential to ensure the most vulnerable mothers and newborns receive focused attention and enhanced care.



Transforming quality of care for babies born too soon, too small or who become sick

The inpatient care required for small and sick newborns includes preventive care (such as feeding support, thermal control, such as kangaroo mother care (KMC), and the prevention of infection), and treatment for complications like infections and jaundice. Service readiness involves infrastructure, equipment and

commodities, as well as health workers with the correct training and skills and the involvement of the family in inpatient care. In 2018, the Every Newborn tracking tool was updated with additional questions to support the establishment of baseline data on the care for both small and sick newborns.

Progress for babies born too soon, too small or who become sick

-  **Half of all countries have a national guideline or strategy for the care of small and sick newborns.**
-  **Approximately half of countries report having an educational pathway or on-the-job capacity-building for health providers to gain neonatal nursing competencies.**
-  **Since 2014, there has been steady progress in adopting policies for KMC, yet only one third of countries currently have an updated national policy or guideline on KMC: and this is progress in a further 28% of countries; 20% of countries report having an indicator for newborns that benefited from KMC in the HMIS.**
-  **Half of all countries have an updated national policy/guideline on postnatal care.**



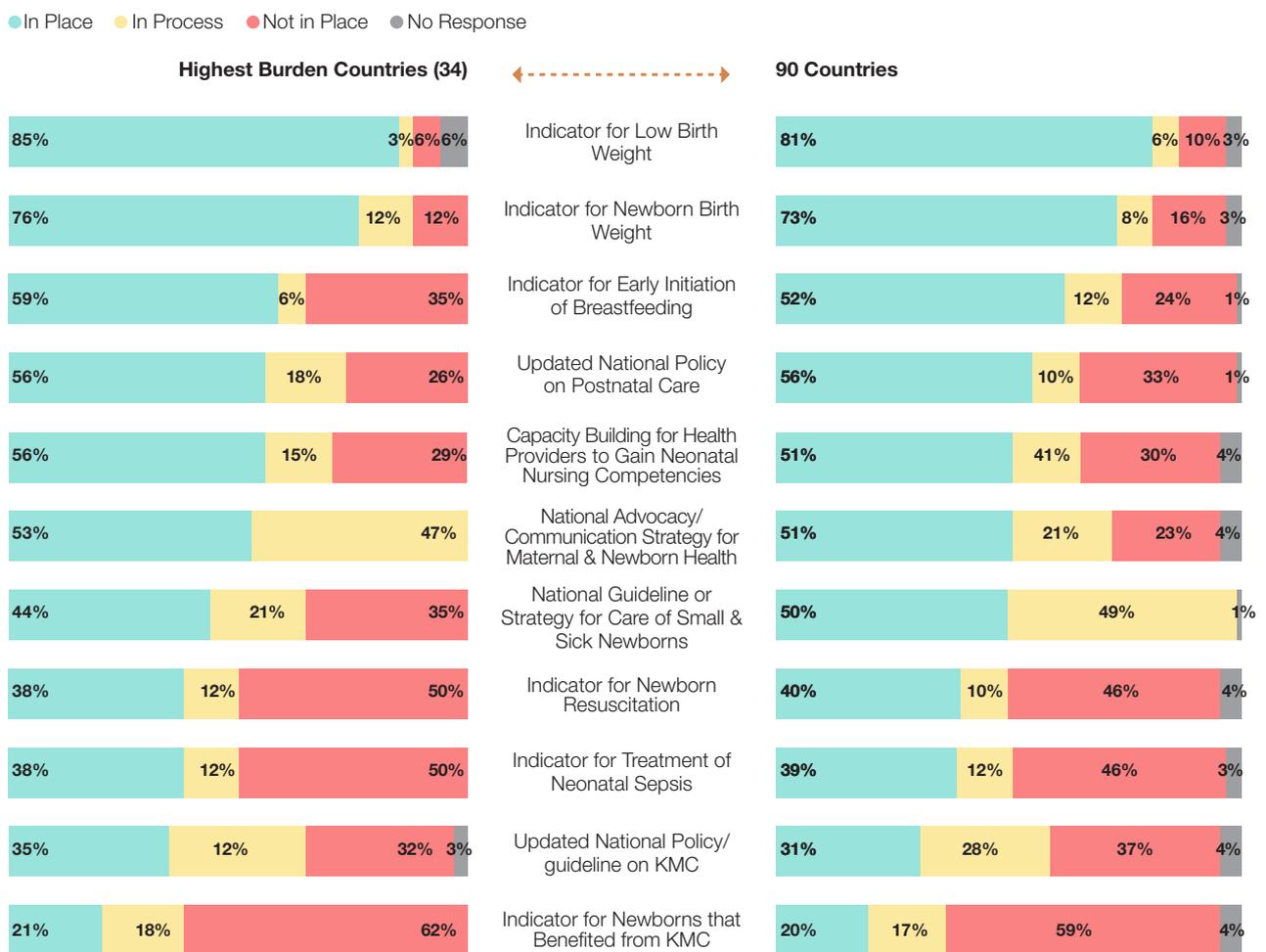
Status of small and sick newborns in the 34 highest burden countries



44% of countries with the highest burden of newborn mortality have a national guideline or strategy for the care of small and sick newborns; 21% report that this is in progress.

Fig. 24 shows a range of activities to support care for small and sick newborns in countries with the highest burden of mortality. It compares how prepared they are compared to all 90 countries.

Fig. 22. Progress in caring for small and sick newborns; 34 highest burden countries compared to all countries



ENAP: Every Newborn Action Plan; KMC: kangaroo mother care

SPOTLIGHT: Partnership to support scaling-up Kangaroo Mother Care (KMC) in South Asia

South Asia, with close to a million newborn deaths annually, accounts for nearly 40% of the global burden of mortality in this age group (72). Prematurity accounts for more than one third of newborn deaths in the region. KMC was identified as a cost-effective and evidence-based intervention that, if universally implemented, has the potential to avert up to 150 000 preterm deaths each year in the region. UNICEF estimates that preterm birth accounts for 35% of neonatal deaths globally, and KMC can prevent more than 40% of these deaths (73, 74).

KMC involves skin-to-skin care, early initiation of breastfeeding and ensuring that the newborn and caregiver are kept together: this is proven to reduce stress and anxiety, benefits the newborn's weight gain and aids neurodevelopmental progress. Country-level commitment and successful global technical and financial partnerships are currently supporting the introduction and scale-up of KMC services in eight countries in the south Asia region. A regional consultation in December 2018 made key recommendations and adopted a zero-separation policy for caregivers and mothers.

In WHO's South-East Asia Region, advocacy at country and regional level with decision-makers and programme experts supports the inclusion of KMC in newborn health programming, as well as the development of national KMC guidelines and training materials for MNH programmes. Advocacy for inclusion of KMC indicators in national health information systems is in progress through regional consultations and capacity-building workshops, creating a pool of trainers and country action plans to scale-up the intervention.

UNICEF and WHO collaboration aims to improve KMC quality at the point of care, together with other essential newborn care services, and is supported by the Bill & Melinda Gates Foundation and other partners. Eleven KMC centres of excellence have been established in Bangladesh, India and Pakistan with KMC services in 981 health facilities in the region. Bangladesh, India and Sri Lanka have already included KMC in national health information systems and others are in process. Advocacy efforts have helped create budget lines for KMC at national (Bangladesh and Pakistan) and subnational (India) levels. Millions of people have been reached with information and education materials, including through social media.

Sustained and at-scale implementation is the most pressing challenge to KMC services. This is due to facility infrastructure and human resource challenges, lack of specific budget lines resulting in limited financial resources, and inadequate levels of awareness among decision-makers and at community level. Data completeness and consistency for decision-making is still hampered in many places by a lack of national KMC monitoring and evaluation.



SPOTLIGHT: Supporting breastfeeding in health facilities: Viet Nam

The first few hours and days of a newborn's life are a critical window for establishing lactation and for providing mothers with the support they need to breastfeed successfully. Since 1991, the Baby-friendly Hospital Initiative (BFHI) has helped to motivate facilities providing maternity and newborn services worldwide, to give better support to breastfeeding. Based on UNICEF and WHO's *Ten steps to successful breastfeeding* (75) the BFHI focuses on providing optimal clinical care for new mothers and their infants. There is substantial evidence that implementing the "ten steps" significantly improves breastfeeding rates.

UNICEF and WHO recommend that breastfeeding is initiated within the first hour of birth, continued exclusively for the first six months of life and, with safe and adequate complementary foods, for up to two years or beyond. Only 44% of infants initiate breastfeeding within the first hour of birth and 40% of all infants under 6 months of age are exclusively breastfed (76). In 2017, only 10% of infants worldwide were born in a facility currently designated as "baby-friendly". The BFHI has been a standalone initiative in most facilities and has not been integrated into the broader health system as an essential component of quality of care improvement. Limited staff training on the ten steps has been a key obstacle to implementation.

In 1994 the Viet Nam Ministry of Health took up the BFHI, with hospitals making voluntary commitments to the ten steps. However, most hospitals failed to commit to full implementation and in 2013 the Ministry of Health included BFHI criteria into national hospital quality criteria, thereby integrating it into the health system. These criteria include indicators on hospital management, administration, safety, service delivery and obstetric and gynaecological practices. Hospital assessment criteria are close to international standards and based on a five-grade hierarchy, with Grade 1 being very poor and Grade 5 good quality.

If hospitals cannot meet Grade 3 in three years, they will not receive full reimbursement by government health insurance. This provides a strong incentive for quality improvement. Although the goal of having all hospitals with a score of Grade 3 within three years has not been achieved, 74% of obstetric hospitals achieved scores of Grade 3 or higher for the BFHI criteria in 2015. The Viet Nam case study concluded that integrating BFHI into the health system, coupled with regular monitoring, is the most sustainable and effective way to support compliance among maternity services.

In 2018, WHO and UNICEF released revised implementation guidance (77) based on learning from countries over the BFHI's 25-year experience. By reinvigorating the BFHI and ensuring that all facilities adhere to evidence-based recommendations on maternity and newborn care, breastfeeding rates can be substantially increased and the health of mothers and children dramatically improved.

IMPLEMENTATION GUIDANCE

Protecting, promoting and supporting breastfeeding in facilities providing maternity and newborn services: the revised **BABY-FRIENDLY HOSPITAL INITIATIVE**



2018



Progress with ensuring access to essential commodities and medicines

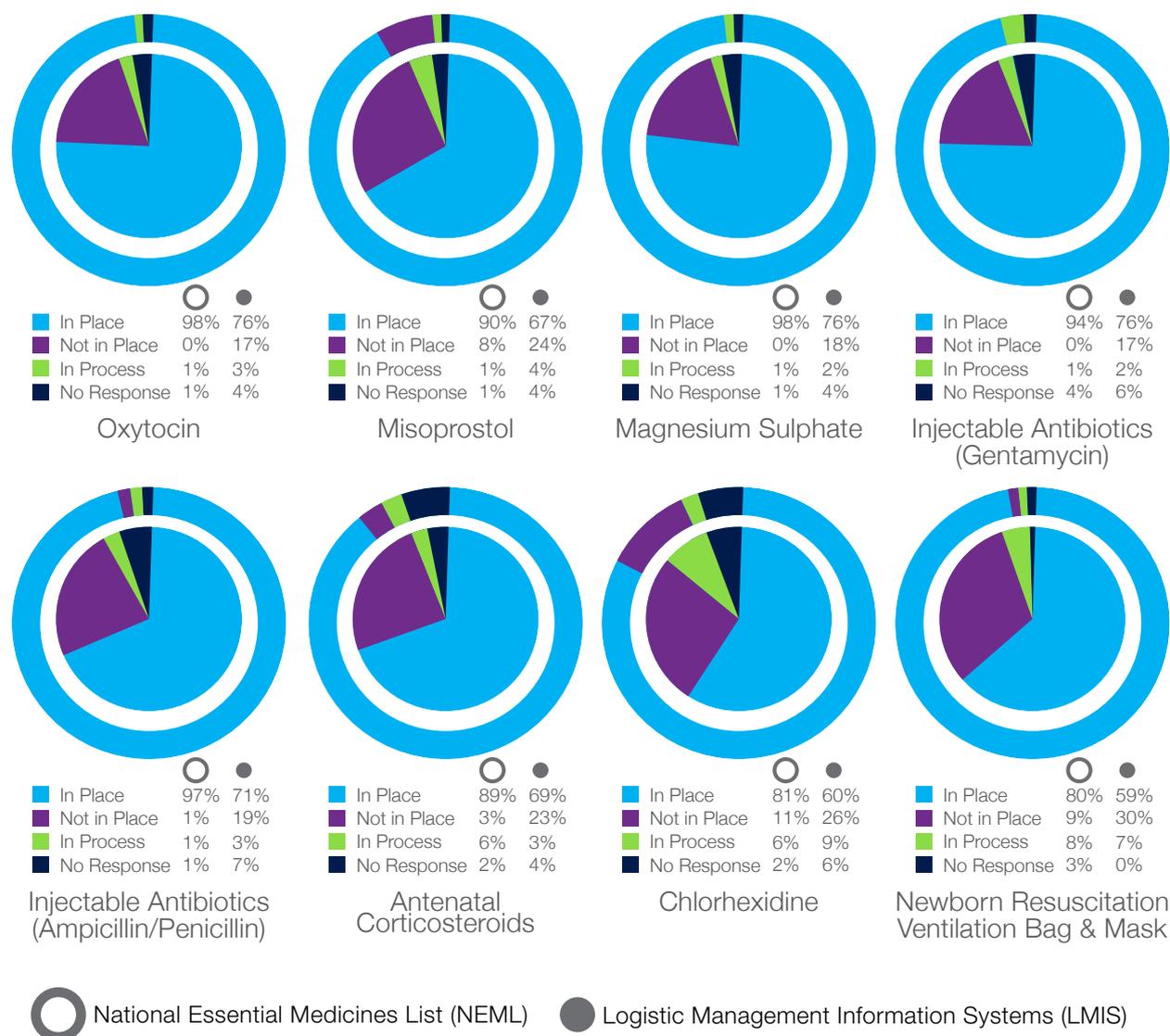
A quality health service needs safe, effective, affordable and qualified medications available in adequate quantities at all times, with appropriate dose and dosage forms. The Life-Saving Commodities Commission for RMNCAH stimulated excellent progress to increase access to essential medicines. Almost all countries have included the eight essential medicines for MNH in their national essential medicines lists.

However, managing the drug supply is a very complex process that requires strong organizational structure and a supply chain. A logistics management information system (LMIS) across all the supply chain levels has many benefits including: maintaining commodity availability; improving service-seeking by the community; enhancing the quality of care; and, increasing professional satisfaction and morale.

Lack of access to essential health products in most developing countries, particularly sub-Saharan Africa, is mainly due to poor LMIS data quality. There is a much lower level of progress in ensuring an LMIS for each essential commodity (Fig. 23).

Almost all countries have listed the eight essential MNH medicines on their national essential medicines list, but far fewer have an LMIS for for each essential medicine

Fig. 23. Progress to ensure essential medicines are on both the NEML and LMIS





BED

Milestone 3: Investment in health workforce

Develop or integrate costed human resources (HR) for health strategy into RMNCAH plans and ensure sufficient financial resources are budgeted and allocated. Ensure training, deployment and support of health workers, in particular midwifery personnel, nurses and community health workers.

Quality care is evidence-based, safe, well-organized, accessible, adequately resourced, efficient, provided in a timely manner, and people-centred. The role of health workers in delivering quality care is often compromised because they do not have the resources to do their job; face difficult work conditions - including being overworked; lack necessary commodities and tools; and are without the competencies, training and support required to deliver quality care.

Globally, more than 80% of all births now occur with a skilled birth attendant in a health facility. It is essential that national planning and policy ensure the provision

of quality maternal and newborn care through a well-trained, mentored and supported workforce. Increasing studies have shown that access to health is essential, but it is access to quality care provided by trained, supported health professionals that has the greatest impact on lives saved (78). However, year-on-year trends are showing low levels of progress in countries.

For those 20% of births – 40 million births globally - that continue to occur outside a health facility, it is essential that national planning and policy increase equitable access to, and demand for, care by a skilled birth attendant.



43% of all countries report having a human resource plan or strategy.



32% have retention policies or a strategy to mentor, support and retain skilled and other relevant cadres. This represents minimal progress from 2017.



87% report having competency and skills-based service/training/education for MNH. This represents an 8% increase from 2017.

Building neonatal care competencies of existing providers and creating or expanding their neonatal nursing cadres, is a crucial step to improving the quality of care for those babies born too soon, too small or who become ill.



62% of countries report having specialized training in place to ensure care for those born too soon, too small or who become sick.

Supporting health workers to deliver quality UHC

In those countries with the highest NMR, there is slow progress to ensure a strong and supported health workforce. This is despite the evidence that complications of pregnancy and childbirth, and death in the first days of life can be tackled with cost-effective

and lifesaving treatment. This requires strengthened midwifery and neonatal nursing education, supportive mentoring and ensuring that health cadres are supplied with the tools to fulfil their role. Across five variables for health workforce strengthening in MNH, there is slow progress in countries with the highest number of newborn deaths and even less progress in countries with the highest newborn mortality rates (Table 9).

Table 9. Human resources for MNH in 34 highest burden countries

High-burden countries	Human resource strategy for skilled birth attendants	Retention policy/strategy for skilled birth attendants or relevant cadres	Competency and skills-based service/training/education for MNH	Continuing education for health providers in MNH	Educational pathway/on-the-job capacity-building for neonatal nursing competencies
India					
Nigeria					
Pakistan					
Democratic Republic of the Congo					
Ethiopia					
China					
Indonesia					
Bangladesh					
United Republic of Tanzania					
Afghanistan					
Sudan					
Uganda					
Angola					
Philippines					
Kenya					
Mozambique					
Côte d'Ivoire					
Egypt					
Mali					
Niger					
Somalia					
Central African Republic					
South Sudan					
Lesotho					
Guinea-Bissau					
Chad					
Mauritania					
Sierra Leone					
Benin					
Djibouti					
Comoros					
Equatorial Guinea					
Togo					
Yemen					

MNH: maternal and newborn health

SPOTLIGHT: Sierra Leone's specialized care for preterm babies and support for adolescent sexual and reproductive health among adolescents

Adolescent health and pregnancy, as well as newborn health, require an integrated focus. Complications from pregnancy and childbirth are the leading cause of death for 15-19-year-old girls globally. Some 11% of all births worldwide are to girls aged 15–19 years, and the vast majority of these births are in low- and middle-income countries. There is an increased likelihood of preterm birth and low birth weight in these circumstances.

"I am happy to be mother to my two babies and now hope to learn a lot from the nurses so that the children grow well," says Mayatu Kamara, facing the challenges of being a mother of twins at the age of 16.

The nurses at Makeni District Hospital's special baby care unit (SBCU) are conscious of her situation and give her the support and advice she needs to ensure that the babies survive and grow well. Attending to sick babies who require special care and attention is something the unit does on a regular basis. Each month, between 50 to 60 sick babies are admitted because they are born prematurely, have infections or suffer from birth asphyxia requiring close and immediate specialized attention and treatment.

In this SBCU, low birth-weight babies are common among teenage mothers like Mayatu. More than 80% of the cases in the unit are from this age group. Without regular specialized treatment and support, there is very little chance of their babies surviving beyond their first month of life. Mayatu and her two babies will spend a minimum of two weeks in the hospital while the babies are monitored for growth and she is given lessons on how to look after them at this delicate stage of their lives.

Sierra Leone has one of the highest NMRs with 34 babies dying per 1000 live births. Prematurity accounts for most of the deaths. Since 2017, UNICEF has been supporting the expansion of SBCUs in Sierra Leone. Now established in three regional government hospitals in Bo, Makeni and Kenema districts and in one tertiary hospital in western Urban district, these specialized units have been equipped with incubators, phototherapy machines, resuscitators, oxygen concentrators and specialized equipment required for the immediate special care of sick babies.

In Sierra Leone, it has been estimated that 28% of 15-19-year-olds are pregnant or have given birth once. In response, the Ministry of Health and Sanitation has developed and endorsed a *National adolescent pregnancy and child marriage reduction strategy (2018-2022)*. The strategy was developed to guide the prioritization of all evidence-based adolescent pregnancy and child marriage reduction interventions. This includes a broad range of activities to support adolescent sexual and reproductive health:

HIV Programme: Happy Kids and Adolescents (HAPPY) transform HAPPY resource facilities into adolescent-friendly centres where they can meet to access information on HIV/sexual and reproductive health (SRH) and other issues, through sharing experiences, audio visuals, counselling, posters and library resources. Two of the facilities conduct HIV tests for adolescents; offer sensitization on menstrual hygiene management; train adolescents (boys and girls) and support them to conduct peer education on HIV/SRH; train and support adolescent community participatory theatre groups as part of group peer education.

Child Protection: establishing safe spaces in communities where adolescent girls can discuss SRH/teenage pregnancy prevention and prevention of harmful traditional practices; train adolescents in life skills to empower them to take informed decisions based on an approved manual; train social workers to conduct community-based training on life skills mainly targeting adolescent girls.

Education and WASH: promote menstrual hygiene management in schools.

The Sierra Leone Ministry of Health and Sanitation supported by UNFPA and UNICEF plans to revitalize clinics to ensure they complement the national Free Quality Education programme with came into place in September 2018 and to establish adolescent-friendly services nationwide.

SPOTLIGHT: Mapping neonatal nursing competencies in Rwanda

The Council of International Neonatal Nurses (COINN) has carried out a situation analysis of current inpatient facility-based care for small and sick newborns, to inform development of neonatal care standards, strategies and recommendations for programming.

In Rwanda, 47 neonatal intensive care units participated in an analysis of existing practice-resources including equipment, neonatal knowledge (how much specialist training did the nurses receive), and nurses' confidence levels in performing neonatal intensive care unit skills. The study aimed to guide future neonatal nursing education and development of necessary competencies. Findings indicated that:

- most nurses receive very little orientation or specialized training before starting to work with newborns and their families;
- doctors who provide support to the nurses may not have specialized training either, also doctors were not available 24/7;
- staffing patterns vary by type of referral hospital (district or large hospital). Staffing levels stayed at two nurses on day shift and one on night shift no matter the number of newborns in the unit;
- skill confidence varied too.

The study produced three recommendations: (i) neonatal nurses need more specialized training if they are working with small and sick newborns; (ii) standardize education for orientation; and (iii) a method of consistent performance evaluation is needed.

COINN has developed a list of essential neonatal nursing competencies to begin identifying consistent measures of skills and knowledge. These competencies will guide neonatal nursing educational programmes.





Milestone 4: Community engagement, parent's voices and champions

Involve communities, civil society and other stakeholders to increase demand and ensure access to, and coverage of, essential maternal and newborn care. Shift social norms so that it is no longer acceptable for newborns to die needlessly, just as it has become unacceptable for women to die when giving birth.

Mothers, fathers, families, communities and civil society at large can be powerful agents of change when they can harness their passion and commitment to positively influence policies and programmes to ensure improved delivery of quality care along the RMNCAH continuum.

All stakeholders in MNH have the responsibility to advocate for newborns and to cultivate champions who can be fierce advocates for newborn survival and early childhood development. Advocacy can help spur action by policy-makers, professional associations, health workers, civil society, religious and community leaders, as well as parents and families where most needed.

Advocating and engaging parents and communities is essential to ensure progress to achieve the end of preventable stillbirth and newborn death and achieve quality care for mothers and newborns. Newborn babies do not have a voice of their own to advocate for their right to survive or to reach their human potential, and therefore rely on their families, caregivers and community at large to act as champions on their behalf. Champions are found in our families and communities, in our health facilities and hospitals, across civil society, in the media, in academia, in our ministries of health, finance, education, water and sanitation, in UN agencies and in donor agencies.

Progress toward increasing family and communities engagement in maternal and newborn health



In the period 2017-2018, there was a 10% increase in the development of a national advocacy and communications strategy and a national community engagement strategy

- 50% of countries report this development.
- Half of the 34 highest burden countries have prepared one or both of these strategies, whereas only one third had done so in 2017.



There is low coverage of activities to ensure community engagement in national policy processes

- 30 countries reached 50% or more coverage of mechanisms to capture stakeholder opinion on quality MNH services at the district level.
- 22 countries reached 50% or more coverage of mechanisms to engage stakeholders in identifying and rectifying priority MNH issues at the district level.
- 28 countries have 50% or more coverage for mechanisms to share MNH information at the district level.



Half of countries reported actively including civil society in policy and programme development; in MNH technical working group membership; in the development of their national plan; and in the maternal and perinatal death review process

At the national level, many countries report that maternal and newborn health technical working groups have been broadened to include participation from a broad array of stakeholders. For example, Democratic Republic of the Congo, Gambia, Ghana, Nepal and Nigeria have technical working groups for primary health-care services and quality MNCH, which include stakeholders from professional bodies, private partners and experts, while other countries have technical committees for service management, community engagement, advocacy and strategy review on national and subnational levels.



Overall, 38% of countries report having parent and community advocacy groups for MNH. Of the 34 highest burden countries, 53% report having parent and community advocacy groups; this is in progress in a further 12% of countries



Reported mechanisms to canvas community opinion and ensure participation towards improved maternal and newborn health outcomes

Engaging community voices in the planning and accountability process is nascent in many countries.

- Conferences, summits and dialogues at national and subnational levels were the most used mechanism to capture stakeholder opinions on the quality of maternal and newborn services. One third of all countries used this method most frequently.
- Committees involving community representation were the second most used mechanism. These committees often include a unique mix of stakeholders, such as village volunteers, women's associations, health workers, NGOs and health managers. It was reported that these committees provided governments and partners with information on challenges faced by communities in accessing services and gaps in quality; and enable implementing bodies to identify new strategies and solutions for maternal and infant health, including sharing best practices. Countries using these mechanisms report having biannual, semi-annual and annual review meetings with community stakeholders to review progress and challenges related to maternal and infant health.
- Survey data and opinion polls at national and subnational level are used routinely to monitor service provision and client satisfaction.
 - In Egypt, Iraq, Mozambique, Nicaragua and Zimbabwe community opinions are canvassed on service quality and issues using scorecards and suggestion boxes at health facilities.
 - In Mongolia, an online feedback mechanism through the ministry of health website is in development.
 - Iraq, Lesotho and Malawi reported to have conducted exit interviews with mothers at maternity facilities to gauge client satisfaction. India has launched a mobile app to capture patient feedback for services received and labour room quality.
 - Afghanistan scaled-up "Partnership Defines Quality" committees to five provinces.
- Informal community support groups are active at some levels in countries.
- Social and mass media, and sometimes radio and television networks, are most widely used to capture community opinions on quality of services and other pertinent issues.

Disseminating key messages on MNH through social and mass media accounts for on average 40% of all country-level outreach and advocacy to communities.

- Sri Lanka exemplifies this mechanism detailing how MNH issues are linked with celebrations on special days such as breastfeeding week and World Prematurity Day when the organization of activities to inform the general public and interviews is undertaken with the press. Print media, posters and flyers are important mechanisms to share information and knowledge in the community.
- Information sessions and open days are organized at health facilities to disseminate key information on infant health to families.
- Community health workers are also actively engaged in reaching out to women in the community to offer door-to-door service on prenatal check-ups and health issues.
- Most countries are using common social media channels such as Facebook and blogs to engage virtually with communities, while others use television and radio to disseminate information and key messages regarding MNH. For example, in Ghana, national radio talk shows regularly discuss MNH issues.

SPOTLIGHT: Social and behaviour change campaign in Malawi for small babies

“People used to laugh at other people when they have a preterm baby but now those things have ended, people are now able to discuss with others.”

Village headman, Maching, Malawi.

Preterm babies in Malawi are not receiving adequate care and social norms that undervalue small newborns are an important barrier to improved outcomes. In 2015-2016 the Malawian Ministry of Health and Save the Children piloted a campaign, Khanda ndi Mphatso, Lipatseni Mwayi (A baby is a gift, give it a chance) in two districts.

The Khanda ndi Mphatso campaign aimed to shift individual attitudes and community norms around the value of newborn life and encourage supportive action by and for affected families. The campaign targeted pregnant women and mothers of preterm babies as well as their male partners and influencers.

The image phase used a “branded” campaign to shift individual attitudes and community norms to increase the value of newborn lives. The tactical phase used an intense community engagement and social mobilization component to promote specific health behaviours and encourage family and community support. A mixed-methods evaluation was undertaken 13 months after implementation to understand the campaign effects. Using a quasi-experimental design, the evaluation compared basic implementation sites, which included campaign materials, mass media and facility-based approaches, to comprehensive implementation sites, which added community-based activities.

Data analysed included 247 quantitative interviews with pregnant women and mothers of preterm babies and 15 focus group discussions. Save the Children developed a measure of campaign dosage to explore dose-response, based on reported participation in campaign activities and recall of campaign materials.

The intervention provided direction on future facility and community level strategies that are effective in addressing behavioural and social norms that negatively affect care and survival of preterm and low birth-weight babies. The evaluation showed that the campaign contributed to changes in injunctive norms around the care of newborns, increasing value for low birth-weight and preterm babies, and encouraging social support.

Adaptation of the Khanda ndi Mphatso campaign in other districts has the potential to shift social norms around care for newborns in Malawi. To our knowledge, this is the first social and behaviour change communication campaign to focus attention on these most vulnerable newborns. Despite a short implementation period, the evaluation showed strong results and clearly demonstrated the additional value of community-based activities.

SPOTLIGHT: Every Child Alive campaign in Bangladesh

In 2018, UNICEF Bangladesh launched the *Every child alive* digital campaign with the goal of raising awareness on newborn mortality among at least 60 million people and engaging at least 120 000 digital followers to take action in their communities. This could include, for example, informing a pregnant mother, who is not active on social media, that she should have at least four antenatal check-ups. Programmatic goals included stimulating policy change, investment and scale-up by the government, as well as persuading key donors to increase funding towards ending preventable newborn mortality.

A year into the campaign, over 300 million people have been reached and over 35 million have engaged with the digital campaign in Bangladesh, while over 115 000 actions have been taken in the community. The digital campaign audience is mainly young people between the age of 15-35, of whom a large proportion are young parents. Every day, the *Every child alive* digital campaign activities inform and engage followers through newborn care posts, video content co-created with doctors, Facebook Live, challenges and intensive mini-campaigns around major awareness days.

The high level of engagement has shown that there is a real need and demand for better and more accessible information on newborn and maternal health care in Bangladesh. The results of the digital campaign have been leveraged for advocacy with policy-makers and donors. Since the launch in February 2018, the Bangladesh Minister of Health has pledged to reduce newborn mortality to zero. UNICEF and the Government of Bangladesh have begun constructing specialized newborn care units in district hospitals, introduced improvement processes in facilities for newborn care, and rolled out the national newborn health campaign.

SPOTLIGHT: Strengthening community engagement in Malawi

To create demand for newborn health services, community-based activities are in progress that are being facilitated by health surveillance assistants (HSA), who are being trained to develop counselling and communication skills for MNH at community level.

Using the WHO-adapted training package for care of pregnant and postnatal mothers and newborns at community level, UNICEF is supporting the skill development process to ensure that HSA interactions with women and their families go beyond providing information, to supporting health-seeking behaviour towards improving the health and survival of newborns. The HSAs are also tasked with conducting home visits to identify danger signs and facilitate referral in relation to pregnancy, postnatal and newborn care.

In collaboration with the Ministry of Health, UNICEF and implementing partners have trained 693 HSAs as part of the Community-Based Maternal and Newborn Care Programme since January 2018. These HSAs have acquired competency skills to promote birth in a facility, home care for the pregnant woman, supporting mothers in initiating breastfeeding, assessing pregnant women, postnatal women and newborns for danger signs, measuring weight and identification of very small babies. More HSAs will be trained in 2019.

The project has also engaged community volunteers to act as links between the HSAs, community members, pregnant women and newborn babies; focusing especially on the need to facilitate timely referral to HSAs for an exclusive home visit. All 693 trained HSAs have an active community Health Action Group with a membership of 10 representatives for every HSA. Other strategies include producing radio programmes with MNH messages.



Milestone 5: Data

Count every newborn by using and improving programmatic coverage data including equity and quality gap assessments. Institutionalize civil registration and vital statistics (CRVS), adapt and use a minimum perinatal data set, implement maternal and perinatal death surveillance and response.

Improving routine data collection accelerates change, with a stronger focus on coverage, quality and outcomes. Existing data need to be used better for accountability and action. At a minimum we need to ensure we report and review all deaths, produce a birth and death certificate for everyone, including stillbirths, ensure we are capturing key indicators in our health information management systems and monitoring the programmatic coverage of health interventions to ensure universal access to and coverage of quality care.

Maternal and perinatal death audits: a key to improving quality of care

Establishing and conducting maternal, perinatal and paediatric death audit and review is an essential part

of the overall quality improvement at each health facility. Death review or mortality audit is a means of documenting the causes of a death and the factors that contributed to it, identifying factors that could be modified and the actions that could prevent future deaths, and putting actions into place and reviewing outcomes of these actions.

While not all deaths are preventable, death audits show commitment from policy-makers and managers to improve quality of care. Some of the key challenges that hamper implementation are the poor linkages made between death audits and quality improvement at facility level, human resources and staff capacity, and the sensitivities surrounding the blame for death.

 **83% of countries reported having an MDSR policy and 51% have involved the community in the policy development process. Implementation of the policy appears to be progressing at a slower rate. So far, only two thirds of countries report having a national review panel in place.**

 **53% of countries have a perinatal death review policy; just 23% involved the community in the policy development and 25% reported that they are not in the process of developing this important policy. Just 22% of countries have an indicator of perinatal death review in their HMIS systems.**

 **In the period 2016-2018, half of the 34 countries with the highest burden of mortality developed a perinatal death review and response system.**

 **15 highest burden countries do not have this system in place. Most of these countries are humanitarian and fragile settings.**

Table 10 shows those countries that have a perinatal audit system.

Table 10. Countries with a perinatal audit system in place

Yes (48) 9 highest burden	In process (17) 8 highest burden	No (22) 15 highest burden
Argentina, Armenia, Azerbaijan, Benin, Bhutan, Cabo Verde, Cameroon, Chad, China, Democratic People’s Republic of Korea, Egypt, Eritrea, Gambia, Georgia, Ghana, Guinea, Indonesia, Iraq, Islamic Republic of Iran, Kazakhstan, Kenya, Kiribati, Lebanon, Liberia, Madagascar, Malaysia, Maldives, Mali, Mongolia, Mozambique, Namibia, Nepal, Nicaragua, Occupied Territory of Palestine, Rwanda, Samoa, Senegal, Seychelles, Slovakia, Solomon Islands, Sri Lanka, Tajikistan, Togo, Tunisia, Uganda, United Republic of Tanzania, Zambia, Zimbabwe.	Bangladesh, Burkina Faso, Côte d’Ivoire, Eswatini, Ethiopia, India, Jordan, Kyrgyzstan, Lesotho, Malawi, Mauritania, Morocco, Pakistan, Philippines, Puerto Rico, Turkmenistan, Venezuela (Bolivarian Republic of).	Afghanistan, Angola, Burundi, Central African Republic, Comoros, Congo, Democratic Republic of the Congo, Djibouti, Equatorial Guinea, Guinea-Bissau, Libya, Niger, Papua New Guinea, Sierra Leone, Somalia, South Sudan, Sudan, Syrian Arab Republic, Timor-Leste, Uzbekistan, Viet Nam, Yemen.

Note: Total number of countries reporting is 88.



SPOTLIGHT: Use of maternal and perinatal death surveillance and review scorecards in Lagos State, Nigeria

In June 2018, with support from Evidence for Action-MamaYe, Lagos State Accountability Mechanism for Maternal, Newborn and Child Health (LaSAM) finalized maternal and perinatal death surveillance response (MPDSR) scorecards to track key indicators in all secondary health facilities from January to June 2018 (Fig.24) (79).

Scorecards captured data for 15000 births across 23 facilities in Lagos State over a large range of indicators on maternal death review, perinatal death review, and the timely collection of and use of maternal and perinatal death review data to review and respond to each incidence of mortality. The scorecard findings facilitate a review and analysis process that aims to identify areas requiring system strengthening.

Based on the results LaSAM asked the Lagos State Ministry of Health to:

1. Employ more medical/health personnel (all cadres) for general hospitals in the state.
2. Request that the Primary Health Care Board ensures its officers adhere strictly to the early case referral policy of the state.
3. Supply service delivery protocols to all facilities that do not have them.

Fig. 24. MPDSR Scorecard for Lagos State, Nigeria.

INDICATORS	FACILITY		
	General Hospital Alimosho	Island Maternity	General Hospital Badagry
NO OF DELIVERIES IN THE FACILITY	1185	1742	469
REVIEW OF MATERNAL DEATHS			
Number of maternal deaths in the last 6 months	13	18	6
Number of maternal deaths reviewed in the last 6 months	11	13	6
% of maternal deaths reviewed	 85%	 72%	 100%
REVIEW OF PERI-NATAL DEATHS			
Number of perinatal deaths in the last 6 months	56	74	14
Number of perinatal deaths reviewed in the last 6 months	9	11	8
% of perinatal deaths reviewed	 16%	 15%	 57%
USE OF MDR EVIDENCE			
MPDSR Committee has an action plan for current quarter			
Action plan contains clearly defined activities			
Number of activities in this quarter's action plan	19	29	10
Number of activities in action plan implemented during this quarter	10	24	3
% of actions implemented	 53%	 83%	 30%
MPDSR MEETINGS AND REPORTING			
MPDSR Committee hold monthly meetings with minutes of meeting			
MPDSR focal person is notified of all maternal deaths within 24 hours			
MPDSR focal person is notified of all perinatal deaths within 24 hours			
LGA District Surveillance Notification Officers (DSNOs) are notified of all maternal deaths within 48 hours			
LGA DSNOs are notified of all Perinatal Deaths within 48hrs			

Source: Lagos State Accountability Mechanism for Maternal, Newborn and Child Health (2018) (79).

SPOTLIGHT: Skill building for perinatal death reviews tested in the United Republic of Tanzania

ENAP calls for *counting Every Newborn* by investing in birth and death registration coverage and quality; promoting the recording of every birth - live or stillbirth; recording stillbirths and neonatal deaths; institutionalizing perinatal death reviews and taking action to address avoidable factors identified by these reviews.

UNICEF and WHO together with Save the Children and other partners in the MPDSR Technical Working Group, have developed a facilitator guide coupled with power-point presentations and other resources that can be used for skill building health facility teams. These resources are intended to be used in sync with other MPDSR initiatives in-country and linked to activities aimed at improving the quality of care for mothers and newborns.

The guide was pretested in Njombe Province, United Republic of Tanzania, in August 2018. The process identified health workers' needs and skills and included MPDSR reviews. This showed: (i) that materials were easy to follow but need to be in the Swahili language; (ii) although data exists from District Health Information System (DHIS2) analysis, interpretation and use to inform planning was lacking; and, (iii) familiarity and understanding of the international categorization of diseases was limited.

The guide focuses on clarifying common myths and misconceptions; defining key terminologies; aims and objectives of perinatal mortality reviews; audit cycle; setting up facility processes for effective reviews; and strengthening linkages with quality improvement efforts. Multiple case studies and tools are used to clarify concepts and allow practise calculation of important perinatal indicators.

Each neonatal death and stillbirth is an immense tragedy but if the lessons are learnt and systemic failures are addressed, lives can be saved and the quality of care improved. Conducting perinatal death reviews in a non-judgmental, non-punitive and culturally sensitive manner is important to ensure the confidence of health providers to engage in a meaningful way.



Civil registration and vital statistics

Counting the number of deaths accurately and ensuring we gain a better understanding of the causes of death are key to tackling the 2.5 million newborn deaths and 2.6 million stillbirths that are estimated to occur each year. One quarter of babies do not have a birth certificate and most neonatal deaths and stillbirths have no death certificate, let alone information on the cause of death and the contextual factors that contribute to these deaths (Table 11).

For those children that have never been registered, this is against the Convention on the Rights of the Child that stipulates all children have a right to an identity; it also shows that we have not made adequate progress towards meeting our SDG 16.9 target “to provide legal identity for all, including birth registration” and SDG 17.19.2 “proportion of countries that ... have achieved 100% birth registration and 80% death registration”. Furthermore, consistent information about the cause of death is needed to improve the quality of care in health facilities, and for health systems planning and resource distribution.

 **41% of countries reported having an indicator for birth registration and 14% said it was in progress.**

Table 11 highlights the low levels of birth registration in a selected group of the 34 highest burden countries. The three columns identify missed opportunities to register births, because each interaction between the child and Ministry of Health services in the time around birth is an opportunity to register. Skilled attendance at birth and institutional deliveries are key moments to ensure registration.

Table 11. Birth registration in highest burden countries

	Birth registration in 2017 (%)	Opportunity to register each birth		
		Opportunity 1. Estimated coverage of birth attendance (%)	Opportunity 2. Institutional delivery (%)	Opportunity 3. Newborn postnatal visits (%)
Afghanistan	37	45	43	–
Angola	36	47	46	–
Bangladesh	31	42	37	32
Chad	16	24	22	–
Democratic Republic of the Congo	28	80	80	8
Ethiopia	7	16	16	0
Guinea-Bissau	24	45	44	55
Lesotho	45	78	77	–
Mozambique	48	54	55	–
Nigeria	30	38	36	14
Pakistan	34	52	48	43
Somalia	3	33	9	–
Uganda	30	57	57	11
United Republic of Tanzania	16	49	50	2

SPOTLIGHT: BR4MNCH - Birth registration for maternal, newborn and child health in Ethiopia and South Sudan

Ethiopia's Health Sector Transformation Plan (2016-2020) incorporates the health sector's role in strengthening CRVS systems. Birth and death notification are two official indicators in the plan. Since the roll out of the civil registration system in 2016, 14% of births have been registered between 2016 and 2018.

Between 2014 and 2018, Ethiopia and South Sudan received funding from the Government of Canada to implement a birth registration project for MNCH (BR4MNCH). This project aimed to: (i) increase birth registration of children aged 0 to 5 years; (ii) improve the use of health information for MNCH operational planning, with an emphasis on community-based information; and (iii) strengthen interoperability between the CRVS and health systems.

For Ethiopia, the BR4MNCH project was timely as it responded directly to ongoing government efforts to operationalize a conventional CRVS system across the country. The financial and technical assistance channelled through the project helped the development of registration instruments (certificates, guidelines, directives and tools), strengthened the institutional and technical capacity of registration bodies and personnel, and created community awareness and demand for civil registration services.

In the five target regions 14 796 civil registrars were trained during the lifespan of the project and 88.5% civil registration centres are now functional. Following advocacy efforts, the government enacted legislation to extend the system's scope to include refugees and asylum seekers. Furthermore, the project has helped national-level introduction of the birth and death notification business process and design of standard birth and death notification forms.

In South Sudan, there has been strong progress despite ongoing conflict and humanitarian crisis, constant government turnover, and little capacity between the two ministries to divert resources or attention from ongoing security concerns and urgent need for lifesaving interventions:

- Civil Registry Act signed into law in September 2018;
- Birth notification of over half a million children under 5 in a digital health database;
- Birth notification integrated with other child protection activities including family tracing and reunification; psychosocial support; and community volunteers trained to issue birth notification;
- A national communication strategy for birth notification developed;
- A national community health investment case analysis conducted;
- Birth notification integrated into the National Mother and Child Handbook to be rolled out by the Ministry of Health in 2019;
- CRVS integrated into the national midwifery and nursing curriculum; 16 principles/directors and 30 tutors from the 15 health sciences' institutes trained in CVRS.

Source: Birth registration for maternal, newborn and child health, end of project report (2014-2018). New York: UNICEF; 2019 (80).

Country progress on newborn-specific interventions in HMIS

Health management information systems (HMIS) provide essential information for national policy-makers, district health managers, facility administrators and health-care workers across health system levels, serving as the backbone of national health service delivery programmes.

HMIS information can be used to provide accountability to communities; guide quality improvement efforts, programme management decisions, and resource allocations; inform research and programme priorities; and help measure progress towards national and subnational health goals and targets. HMIS data represent an accessible source of service delivery information in most low and middle-income countries (LMICs), especially because health services in these countries are often provided through national government programmes in which information is collected and aggregated across public sector facilities.

Therefore, it is essential that countries collect at least the minimum data for each birth and death. This includes mother's age, place of delivery, birth weight, gestational age and birth outcome. Essential newborn care for all infants is now mainstreamed in many national newborn programmes in LMICs, and the priority is shifting towards increasing effective coverage and quality.

The Every Newborn milestones concerning national plans and quality of care both call for specific action for small and sick newborns. The Every Newborn tracking tool maps the ability of countries to determine whether four high-impact interventions (neonatal resuscitation, treatment of serious neonatal infection, KMC and antenatal corticosteroids) are monitored by the HMIS. It is important to note that these indicators require further refinement. The ENAP Metrics Group is assessing the validity of capturing the coverage of facility-based interventions and how these indicators can best be integrated within routine information systems.



Overall findings on indicators included in HMIS



Six of the 90 countries include all four high-impact interventions in the national HMIS in 2018. In 2017, three countries had done so.



Since 2017, there has been a significant increase in the number of countries reporting indicators for newborn resuscitation and treatment of sepsis.

Table 12 provides an overview for all countries including the following highlights:

- more than three quarters of countries have indicators for maternal mortality and for low birth weight;
- two thirds of countries have indicators for stillbirths, on newborns with documented birth weight, for preterm birth and for low birth weight;
- half of countries have indicators for pre-discharge NMR, for newborn deaths by cause, for immediate/early initiation of breastfeeding;
- one third of countries have indicators for use of uterotonic immediately after birth to prevent postpartum haemorrhage, for content of pre-discharge postnatal care, for birth registration, for neonatal death registration with civil registrar;
- one in five have an indicator for perinatal death reviews and newborns that benefited from KMC.

Table 12. Status of key indicators for small and sick newborn care in HMIS (2018)

Indicator for newborns that benefited from KMC	Armenia, Bangladesh, Cameroon, Democratic Republic of the Congo, Ethiopia, Ghana, Guinea, Islamic Republic of Iran, Liberia, Malawi, Mali, Myanmar, Nigeria, Rwanda, Senegal, Sierra Leone, Sri Lanka, Togo (18/90 countries versus 12/74 in 2017).
Indicator for use of antenatal corticosteroids for fetal lung maturation	Argentina, Armenia, Democratic Republic of the Congo, Ghana, India, Iraq, Islamic Republic of Iran, Jordan, Lebanon, Nicaragua, Occupied Territory of Palestine, Pakistan, Rwanda, Samoa, Sri Lanka, Togo, Zambia (17/90 countries in 2018 versus 8/74 in 2017).
Indicator for newborn resuscitation performed	Argentina, Armenia, Bangladesh, Benin, Cameroon, Côte d'Ivoire, Democratic Republic of the Congo, Democratic People's Republic of Korea, Djibouti, Ethiopia, Ghana, Guinea, India, Iraq, Islamic Republic of Iran, Jordan, Kyrgyzstan, Lebanon, Liberia, Malawi, Mali, Mozambique, Myanmar, Nepal, Nicaragua, Occupied Territory of Palestine, Rwanda, Samoa, Senegal, South Sudan, Sri Lanka, Togo, Turkmenistan, Uganda, United Republic of Tanzania (35/90 countries in 2018 versus 19/74 in 2017).
Indicator for treatment of neonatal sepsis	Afghanistan, Argentina, Armenia, Azerbaijan, Burkina Faso, Burundi, Cameroon, Democratic Republic of the Congo, Djibouti, Eritrea, Ethiopia, Guinea, India, Iraq, Islamic Republic of Iran, Jordan, Lesotho, Madagascar, Mali, Mongolia, Nepal, Niger, Occupied Territory of Palestine, Pakistan, Puerto Rico, Rwanda, Samoa, Senegal, Slovakia, South Sudan, Sri Lanka, Sudan, Tajikistan, Togo, Turkmenistan, United Republic of Tanzania, Zimbabwe (37/90 countries in 2018 versus 20/74 in 2017).

KMC: kangaroo mother care; HMIS: health management information systems

 For those 34 countries with the highest burden of newborn mortality and stillbirths, only two countries report having all four indicators in HMIS; the Democratic Republic of the Congo and Togo. Ethiopia, India and Nigeria report that work is underway to include all four indicators.

Table 13 shows the status of HMIS indicators in high burden countries.

Table 13. Status of HMIS research in the 34 highest burden countries

Highest countries	burden	Indicator for newborns that benefited from KMC	Indicator for use of antenatal corticosteroids for fetal lung maturation	Indicator for newborn resuscitation performed	Indicator for treatment of neonatal sepsis
India		In process	Yes	Yes	Yes
Nigeria		Yes	In process	In process	In process
Pakistan		No	Yes	No	Yes
Democratic Republic of the Congo		Yes	Yes	Yes	Yes
Ethiopia		Yes	In process	Yes	Yes
China		No	No	No	No
Indonesia		No	No	No	No
Bangladesh		Yes	No	Yes	No
United Republic of Tanzania		No	No	Yes	Yes
Afghanistan		No	No	No	Yes
Sudan		In process	No	In process	Yes
Uganda		In process	In process	Yes	In process
Angola		No	No	No	No
Philippines		No	No	No	No
Kenya		In process	No	In process	In process
Mozambique		No	No	Yes	No
Côte d'Ivoire		No	No	Yes	No
Egypt		No	No	No	No
Mali		Yes	No	Yes	Yes
Niger		No	No	No	Yes
Somalia		No	No	No	No
Central African Republic		No	No	No	No
South Sudan		In process	No	Yes	Yes
Lesotho		No	No	No	Yes
Guinea-Bissau		No	No	No	No
Chad		No	No	No	No
Mauritania		No	No	No	No
Sierra Leone		Yes	No	No	No
Benin		No	No	Yes	No
Djibouti		No	No	Yes	Yes
Comoros		No	No	No	No
Equatorial Guinea		No	No	No	No
Togo		Yes	Yes	Yes	Yes
Yemen		In process	In process	In process	In process

KMC: kangaroo mother care; HMIS: health management information systems

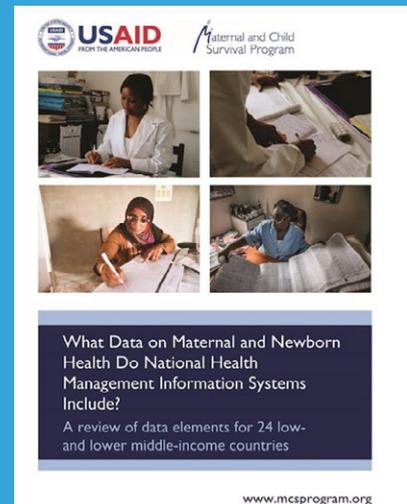
SPOTLIGHT: HMIS-MCSP assessment of 24 countries

The Maternal and Child Survival Program (MCSP) was set up in 2014 by USAID and works with health ministries and other partners in a number of high-priority countries. Recently, the MCSP sought to determine the capacity of 24 countries included in the programme to calculate service use, health outcomes and quality of care measures for ANC, PNC, labour and delivery, as well as a set of recommended global MNH indicators.

The MCSP reviewed the availability of key data elements in HMIS facility registers and monthly reporting forms (81). The goal of the review was to systematically document key data elements found in HMIS documents at facility and subnational levels.

Among its conclusions, the review found the following:

- Deaths were generally counted, but it was difficult to determine their timing and cause using summary form data.
- Most countries, but not all, captured fresh stillbirths, an important measure of the quality of intrapartum care.
- Data on the underlying burden of maternal and newborn complications were often missing; this information would help target quality improvement efforts effectively.
- ANC: use of services was being tracked at high levels. Information on preventive treatments in ANC, such as iron/folate supplementation and deworming medication tended to be available in the register but was not always sent to higher levels to use in national and subnational analysis. Information on tetanus toxoid immunization was an area of strength. Information on syphilis testing and treatment tended to be stronger in sub-Saharan African countries compared to south Asian countries. Screening for complications, such as routine checks and blood pressure measurement, was often absent.
- Countries tracked use and volume of facility childbirth services and birth outcomes for the mother and newborn.
- Certain indicators that were highly relevant for measuring and improving quality of care, and that were recommended for country and global monitoring, were not consistently available in the HMIS in most countries. For example, provision of uterotonics immediately after birth for postpartum haemorrhage prevention was still not widely tracked.
- Only one element of essential newborn care – breastfeeding within 1 hour after birth – was commonly captured in the HMIS.
- Postnatal care registers had the fewest data elements.



Source: *What Data on Maternal and Newborn Health Do National Management Information Systems Include?* MCSP, 2018 (81).



Milestone 6: Research and Innovation

Develop, adapt and promote access to devices and commodities to improve care for mothers and newborns around the time of birth, and agree on, disseminate and invest in a prioritized and coordinated research agenda for improving preterm and newborn health outcomes. Particular focus is required for stillbirths, which are often left out of the research agenda or left behind.

Research on newborn health and stillbirth requires increased investment. There is a continuing unmet need for newborn health research, in particular implementation research across the continuum of care at national level. This includes research into birth defects – an overlooked

issue in maternal and newborn care provision. Surveillance in many low-income settings is non-existent or very rudimentary, especially across Africa. This needs to be strengthened to know what is happening at facility level and to be able to design public health interventions.



39% of countries have a prioritized research agenda.



43% of countries reported have a stillbirth research agenda, and 41% reported having a social and behavioural change research agenda.

The number of countries reporting a research agenda that includes stillbirths has doubled since 2017. Most countries are in the earlier stages of identifying and developing research plans. See Table 14 for details reported by the 34 highest burden countries.

For those 34 countries with the highest burden of newborn mortality and stillbirths, the following findings were made:



15/34 have invested in a prioritized research agenda on newborn health that includes stillbirths. Only 20% are implementing research plans (Table 14).



Half report having a research agenda on social, behavioural and community engagement interventions for MNH.

Table 14 shows the reported status of research in the 34 highest burden countries.

Table 14. Status of research activity in the 34 highest burden countries

	Newborn health research agenda	Newborn health research agenda state of progress	Includes issues related to stillbirths	Includes social, behavioural and community engagement interventions for MNH
India	Implementation	Implementation	Implementation	Implementation
Nigeria	Dissemination	Implementation	Implementation	Implementation
Pakistan	Identification	-	-	-
Democratic Republic of Congo	Implementation	Identification	Implementation	Implementation
Ethiopia	Implementation	Dissemination	Implementation	Implementation
China	Dissemination	-	-	-
Indonesia	Implementation	Dissemination	Implementation	Identification
Bangladesh	Implementation	Dissemination	Implementation	Implementation
United Republic of Tanzania	Implementation	Implementation	Implementation	Identification
Afghanistan	Implementation	Identification	Implementation	Implementation
Sudan	Implementation	Identification	Identification	Implementation
Uganda	Implementation	Implementation	Implementation	Implementation
Angola	Dissemination	Identification	Implementation	Implementation
Philippines	Dissemination	Identification	Implementation	Implementation
Kenya	Identification	Identification	Identification	Identification
Mozambique	Identification	-	-	-
Côte d'Ivoire	Identification	-	-	-
Egypt	Identification	-	-	-
Mali	Implementation	Dissemination	Implementation	Implementation
Niger	Implementation	Implementation	Identification	Implementation
Somalia	Identification	-	-	-
Central African Republic	Implementation	Identification	Implementation	Implementation
South Sudan	Identification	-	Identification	Identification
Lesotho	Identification	-	Identification	Implementation
Guinea-Bissau	Implementation	Identification	Implementation	Implementation
Chad	Identification	-	-	-
Mauritania	Identification	-	-	-
Sierra Leone	Implementation	Identification	Implementation	Implementation
Benin	Identification	-	-	-
Djibouti	Identification	-	-	-
Comoros	Identification	Identification	-	-
Equatorial Guinea	Identification	-	-	-
Togo	Implementation	Development/ review	Implementation	Implementation
Yemen	Identification	-	-	-

MNH: maternal and newborn health

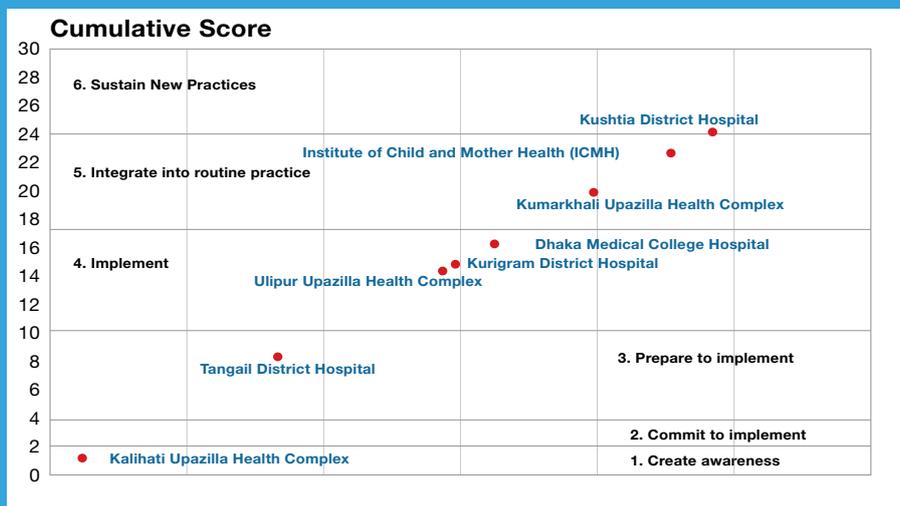
SPOTLIGHT: Newborn health Implementation research in Bangladesh

Progress in Bangladesh in scaling-up evidence-based priority newborn interventions is seen to benefit from permissive policy support informed with evidence from implementation research quickly mainstreamed into health programming.

KMC was prioritized by the Bangladesh Ministry of Health and Family Welfare as an important intervention to improve care for small- and low birth-weight babies. An implementation research study commissioned by UNICEF in collaboration with BRAC School of Public Health, aimed “to assess and analyse the challenges, barriers and enabling factors for the implementation and scale-up of KMC in health facilities in the context of Bangladesh”. Conducted in two phases; the first phase comprised the adaptation of the conceptual framework for progress monitoring of health facilities regarding provision of KMC; and the second phase comprised the assessment of selected health facilities for implementation of KMC. An embedded mixed-methods design using both quantitative and qualitative approach was followed.

To assess the effective coverage and track the progress of KMC in selected health facilities, a consensus-based KMC measurement framework suggested by Guenther et al. (2017) (76) was used. This framework includes two main components: (i) service readiness, based on the WHO building blocks framework; and (ii) service delivery action sequence covering identification, service initiation, continuation to discharge and follow up to graduation. Fig. 25 sets out the results of the study; plotting the progress of each facility towards KMC implementation. Findings were shared with policy-makers, programme managers, professionals, academicians and researchers and recommendations from the policy discussions were adopted for the national newborn health programme by the Ministry of Health and Family Welfare.

Fig. 25. Research findings on progress towards implementation of KMC in health facilities in Bangladesh



Further studies in newborn health currently in progress in Bangladesh include; a situation analysis of inpatient care for newborn and young infants at district and upazilla level facilities, qualitative studies on gender-related differentials in care-seeking for newborns, PBSI implementation research in Kushtia and Lakhsmipur, development evaluation of national scale-up of 7.1% chlorhexidine and scale-up of PBSI management at union level facilities when referral is not possible.

Innovating for devices and commodities that promote health at birth

The Every Newborn tracking tool included the question: What innovations are you planning to scale-up?

During the past year, most countries made use of information technology to design new innovations for the efficient provision of newborn and maternal services. While some countries are still testing programmes and initiatives, others have begun to implement these at scale.

Countries are commonly employing digital health technologies, in particular, m-health (mobile health) and smart phones to enhance coverage and monitoring of maternal and newborn services.

- Democratic Republic of Congo include monitoring pregnancy, childbirth and postnatal care with reminder text messages, while monitoring is used in Guinea-Bissau smartphones for real-time service monitoring.
- India, Kazakhstan and Timor-Leste report to use information technology to rectify gaps in service coverage by disseminating key information on newborn care with mothers, care givers and health workers.
- The FamilyConnect programme sends targeted SMS messages to pregnant women, new mothers, male partners and caregivers with information on newborn care. This initiative is also strengthening the referral chain by sending follow-up SMSs to community health workers.
- Service gaps in remote areas in Kazakhstan are being bridged through tele-consultations.

Digital health information technology is used to improve data collection and patient records.

- India report to be using ANMOL tablets to enable health workers to enter and update beneficiaries' service records in real. Web-based systems are also being used for maternal and perinatal death surveillance in India.

- Information technology to improve facility management by scaling-up a bed-availability system, a neonatal intensive care surveillance system to capture information on neonatal intensive care and GIS mapping to develop neonatal networks is being used in Sri Lanka.
- Chat-bots are reported to be in development in Argentina and nutrition and newborn surveillance systems in Armenia, Egypt and Indonesia.

Countries are also testing out health care innovations to improve quality of newborn services and coverage areas.

- KMC protocols have been scaled-up at health facilities and communities, both nationally and subnationally in Bhutan, Chad, Eritrea, Ghana, Guinea-Bissau, the Islamic Republic of Iran, Morocco, Nepal, Nigeria and Pakistan. Cameroon, Comoros, Malawi, Nigeria, Serbia and Timor-Leste are testing out KMC implementation at a smaller scale.
- Countries report to be testing out new innovations for a large range of procedures such as: hypothermia; postpartum haemorrhage management with uterine balloon tamponade; neonatal jaundice screening; oxygen therapy; service package for birth asphyxia; developmental care; occupational therapy and nutrition of small babies; health-care associated infection control and prevention management at the maternity and newborn level; expanded guide for monitoring child development; alternative birthing positions; and, treatment of sepsis where referral is not possible.

Health-worker training and capacity-building were significant themes for innovations last year.

- Many countries have training protocols in place for essential obstetric and newborn care and safe delivery practices. On-the-job coaching and mentoring reported in the Democratic Republic of the Congo, Ghana, Lesotho, the Philippines and Rwanda.

In Guinea, solar energy units are installed in newborn and neonatal units.

SPOTLIGHT: Digital Health Innovation in Uganda

PRISMS (Protecting infants remotely): MUST is a public university accredited by the National Council for Higher Education in Uganda that has won recognition globally for best practices in outreach and community relations. PRISMS, a mobile phone application, has three fundamental functions: (i) it guides newborn care by providing instant clinical management decisions; (ii) it offers continuous newborn care clinical education to health providers; and (iii) it empowers health managers with real-time surveillance data on the burden of neonatal morbidity and quality of care parameters, which are vital for objective decision-making and resource allocation.

SPOTLIGHT: NEST360 - from data improvement to data implementation in high-burden African countries

Data shows that without immediate action to scale-up quality inpatient care for small and sick newborns, we cannot reach the ambitious SDG 3.2 targets of reducing newborn deaths to below 12 per 1000 livebirths in every country by 2030. Quality data needs to be actively used to drive change for these vulnerable citizens, by tracking performance and accountability to inform global investment. The need is greatest for babies born in sub-Saharan Africa, who face the highest death rates in the world and currently the slowest progress.

To address this need and improve newborn survival, an international, cross disciplinary team from 14 organizations in Kenya, Malawi, Nigeria, the United Kingdom of Great Britain and Northern Ireland, the United Republic of Tanzania and the United States of America, has designed a package of Newborn Essential Solutions and Technologies (NEST360).

The NEST360 innovative-technologies bundle for inpatient hospital care has the potential to halve the 1.1 million newborn deaths per year in sub-Saharan Africa and greatly enhance progress towards achieving the SDG 3.2 target.

NEST works to meet the challenge of the local availability of cost-effective solutions' innovation planning, by developing the needed technologies at a sustainably cost-effective price (approximately US\$ 1.48). Innovations are being driving through a partnership with biomedical engineering curricula at the University of Lagos, and global partners to support and research the implementation.



4. Progress Toward the Every Newborn Global Milestones

Since the Every Newborn Action Plan was endorsed, and the resolution adopted at the World Health Assembly in 2014, regional and global support for implementation of the goals and milestones has been led by WHO and UNICEF, who co-chair the Every Newborn Management Team. Support is coordinated in accordance with the identified needs and technical assistance requests from countries and regions. This support is aligned to the Every Newborn global milestones for 2020 which we set out in the Every Newborn Action Plan (83) Table 15.

Table 15 sets out the Global Milestones. Column A lists global milestones that mirror national milestones. Column B lists the three additional Global Milestones. These are presented as a scorecard, with green for those milestones that are achieved and orange for those in progress. Snapshots of core global activity in support of country progress, and toward the global milestones is documented from page 79 to 97.

Table 15. Every Newborn Global Milestones to 2020

A	Milestones	B	Milestones
1. Data	1. Design and test a minimum perinatal dataset	5. Accountability	Ensure SDG development framework includes specific targets in newborn mortality and stillbirth reduction.
	2. Create a monitoring plan, improve programmatic coverage data including equity and quality gap assessments and Improve indicators and investment to ensure that these are being tracked at scale.		
	3. Count every birth and death for women and babies including stillbirths - invest in civil registration and vital statistics, and innovate to improve and ensure the poorest are counted.	6. Investment	Ensure that investment in maternal and newborn health is continued in 2015 and sustained in the SDG period.
2. Quality	Develop standards of quality and a core set of indicators to assess quality of maternal and newborn care at all levels of the health system.		
3. Research and innovation	Develop, adapt and promote access to devices and commodities to improve care for mothers and newborn babies around the time of birth, and agree on, disseminate and invest in a prioritized and coordinated research agenda to improve preterm and newborn health outcomes. Particular focus is required for stillbirths, who have been left out and left behind.	7. Coordination	Ensure coordinated support among UN partners, donors, academic, non-governmental organizations and the private sector, and intensify efforts in the 20 countries that account for 80 per cent of all newborn deaths.
4. Champions	Develop newborn champions and engage champions in RMNCAH to integrate newborn messaging.		

4.1. Data

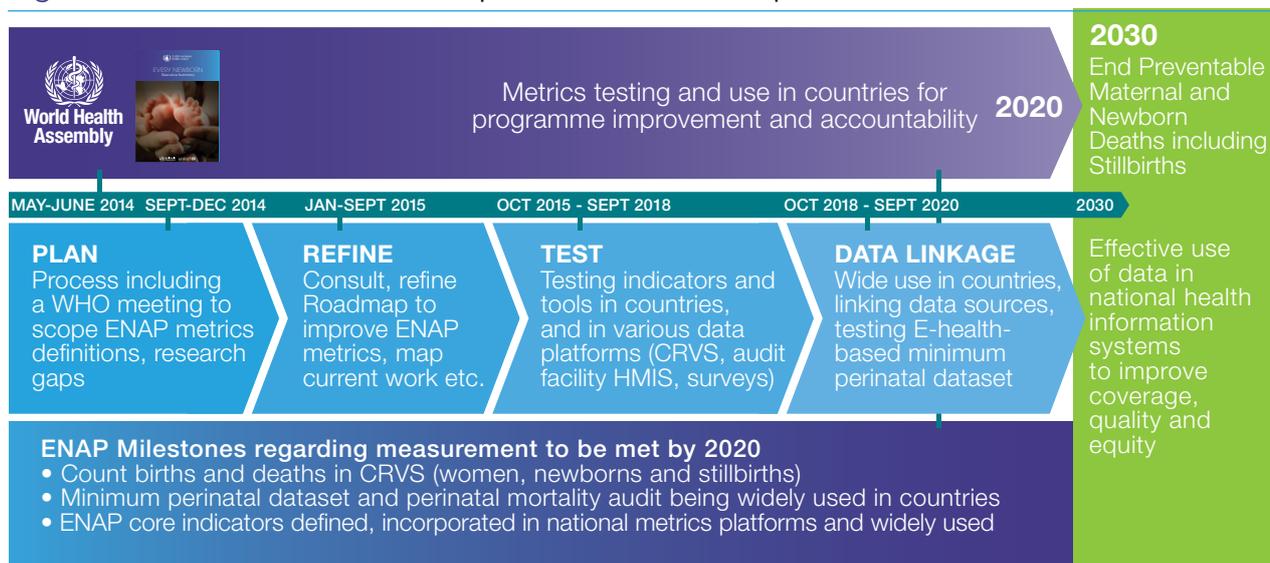
Global progress to improve tracking and use of indicators for newborn health

The metrics team (84) have been building on existing work in metrics to strategically identify and address the main measurement gaps at global, regional and country levels including district and facility levels, and

to increase the number of countries that routinely track core indicators.

The milestones that must be met to achieve the objective of increasing the number of routinely tracked core indicators by 2020 are shown in Fig. 26. The main steps were to define, refine and validate a set of core and additional indicators and then test the feasibility of their measurement in countries.

Fig. 26. ENAP measurement improvement road map 2015-2020



CRVS: civil registration and vital statistics; ENAP: Every Newborn Action Plan; HMIS: health management information system; WHO: World Health Organization



Work is currently in progress to support uptake of core metrics within a number of national and global reporting mechanisms:

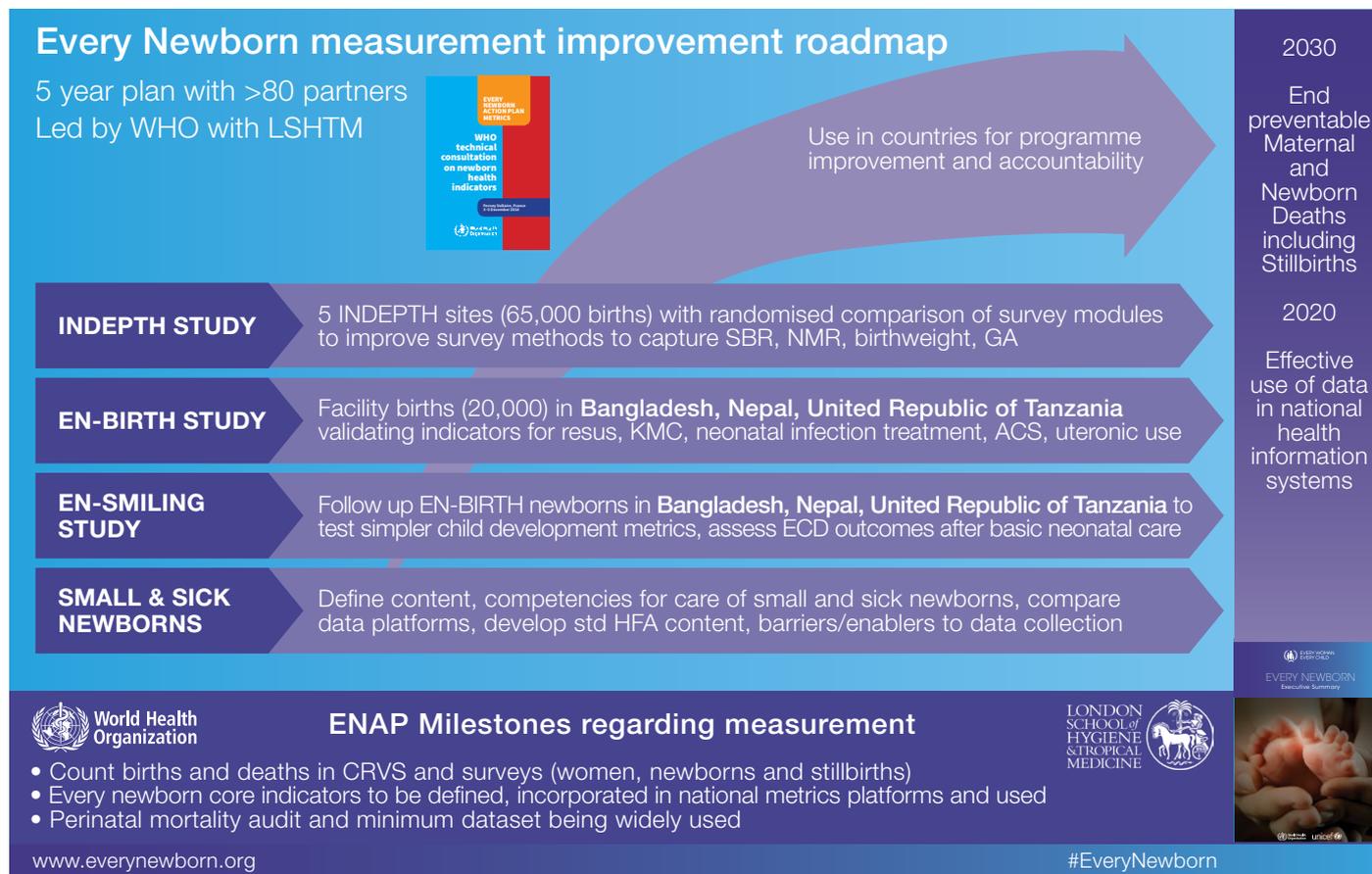
- **MoNITOR** is a technical advisory group to WHO on metrics and measurement of MNH. MoNITOR comprised of 14 external experts who are competitively selected, meets twice a year. MoNITOR's role is to advise WHO on guidance and tools to harmonize and standardize metrics for MNH.
- **Low birth-weight estimates:** In 2019, UNICEF and WHO in collaboration with the LSHTM and John Hopkins University published country, regional and global low-birth weight estimates for 2000-2015 (85). This is the first time such estimates have been made available globally, making it possible to track progress and support various initiatives including the World Health Assembly Nutrition Targets, ENAP and the *Global Strategy for Women's Children's and Adolescents' Health*.
- **RMNCAH HMIS module:** In 2019, WHO and UNICEF developed *Analysis and use of health facility data guidance for RMNCAH programme managers*. This document includes standardized core indicators, suggested analyses and visualizations for RMNCAH health management information systems.
- **New estimates on stillbirth reduction:** In 2020, UN IGME will present updated global stillbirth estimates. This will help identify where extra technical support is needed towards high-quality intrapartum and ANC, including management of infections such as syphilis and malaria, and noncommunicable diseases.
- **Perinatal audit:** An MPDSR Technical Working Group was re-launched in 2017 with key global partners. It aims to improve global surveillance, including integrating the "P" (perinatal) into MPDSR along the continuum of care. New guidance on perinatal audit and classification of perinatal death was published by WHO in 2016. Regional initiatives are helping to drive this work. WHO Regional Office for South-East Asia in partnership with the All India Institute of Medical Sciences has established an electronic integrated perinatal database across a network of 200 hospitals in nine countries; to date more than 1 million births have been documented.
- **The Civil Registration and Vital Statistics** global technical working group, led by the World Bank and UNICEF, is supporting countries to improve the availability, quality, timeliness and use of health information, birth registration and child mortality data to contribute to newborn and child health, survival and protection.



Metrics testing studies

Four studies led by WHO and LSHTM are underway to test the validity of indicators for programme improvement and accountability in countries (Fig. 27). Progress is described below.

Fig. 27. Four studies for Every Newborn measurement



ACS: antenatal corticosteroids; CRVS: civil registration and vital statistics; ECD: early childhood development; ENAP: Every Newborn Action Plan; GA: gestational age; HFA: health facility assessment; KMC: kangaroo mother care; NMR: newborn mortality rate; SBR: stillbirth rate

1. Transforming population-based data with INDEPTH network (EN-INDEPTH)

Population-based household surveys, notably Demographic and Health Surveys (DHS) and Multiple Indicator Cluster Surveys (MICS), are major sources of population-level data on child mortality in countries with weaker CRVS systems, where over two thirds of global stillbirths and child deaths occur. These surveys use a full-birth history or a pregnancy history approach to estimate stillbirths and neonatal/child mortality. No direct comparison of these two methods has been undertaken, although descriptive analyses suggest that the birth history approach may underestimate mortality rates particularly for stillbirths.

An analysis of 70 000 births in five countries using tablet-based randomized comparison of household survey modules found that the pregnancy history method detected 21% more stillbirths compared to the

current full-birth history method. This information will be directly relevant to DHS which undertakes its 5-yearly update of core modules this year. Data on abortions and birth weight are also being analysed, producing additional insights on barriers and enablers to reporting pregnancies and adverse pregnancy outcomes. The results will be used to inform improvements to survey design and training of data collectors.

2. Coverage and quality of facility-based data: EN-BIRTH in Bangladesh, Nepal and the United Republic of Tanzania

In tracking progress on health indicators, many LMICs are transitioning from reliance on household surveys to using routine facility-based data compiled to national level through digital systems such as DHIS2. The Every Newborn *Birth indicators tracking in hospitals (EN-BIRTH)* (87) study is the first large-scale validation of indicators collected through routine facility-based data

for mothers and newborns and was coordinated from LSHTM with funding from CIFF. It includes coverage of high-impact interventions for sick newborns that have never been validated.

For indicators to be useful to policy-makers, it is crucial to be sure they are valid (i.e. measure what they are meant to) and perform well. In five hospitals in Bangladesh, Nepal and the United Republic of Tanzania, over 22,000 births, 800 KMC mother/baby pairs and 900 newborns treated for infection were observed with novel, time-stamped data collection. To test validity, these observations were compared to routine register records and survey of maternal report. Barriers and enablers for routine recording were assessed by qualitative interviews with front-line staff. Analysis is focusing on measurement of quality of care for uterotonics, neonatal resuscitation, immediate breast feeding, kangaroo mother care and treatment of neonatal infection. UNICEF, WHO and national policy-makers are involved in promoting uptake in routine HMIS in these three countries and beyond.

Data were also collected on 1400 newborns treated for infection. These data include observations, maternal recall surveys, register extraction and qualitative interviews with front-line staff. Analysis is underway to assess the measurement of uterotonics, neonatal resuscitation, immediate breastfeeding and KMC in addition to other aspects of quality of care. UNICEF, WHO and national policy-makers are involved in encouraging uptake in routine HMIS in these three countries and beyond.

3. EN-SMILING for early child development measurement

In the SDG era, the focus of global child health is moving beyond *surviving* to *thriving* - ensuring every child has the opportunity for optimal nutrition and development potential. There is increased focus on how to integrate programmes for child development into broader packages of maternal and child health care that have

traditionally been focused on narrow health outcomes (such as newborn care, immunization and nutrition).

Birth is a time of great risk and opportunity for child development. Nearly 10% of disability-adjusted life years (DALYs) globally are due to newborn death and impairment after severe newborn complications. Less is known about developmental consequences for newborns who received basic interventions such as resuscitation, KMC or infection treatment.

The Every Newborn *Simplified management integrating longitudinal neurodevelopment and growth (EN-SMILING)* study will therefore test simplified early child development measurement from birth, (including a WHO screening tool adapted for mobile phone use), and improved detection of developmental delays following basic newborn interventions. This will enable later opportunities to establish if earlier interventions for parents, or through groups, could help improve child development.

4. Facility readiness for small and sick newborns

Millions of babies are born small and sick and require inpatient hospital care with skilled health workers and appropriate equipment. The highest risk is for 15 million babies born preterm (before 37 weeks' gestation), and especially for those born before 32 weeks who may stay in hospital for several weeks.

For years, there have been clear definitions for basic and comprehensive obstetric care enabling assessments of a single facility, or a whole region or country to be compared. This helps improve programmes, advocates for staff and equipment, and links to accountability. A global survey of 61 countries is being used to map potential signal functions to levels of newborn care (88). Relevant service readiness tools are being mapped to develop a standard tool for use, which will also be applied by the Newborn Essential Solutions and Technologies (NEST360).

4.2. Quality

Global progress to advance quality maternal and newborn care

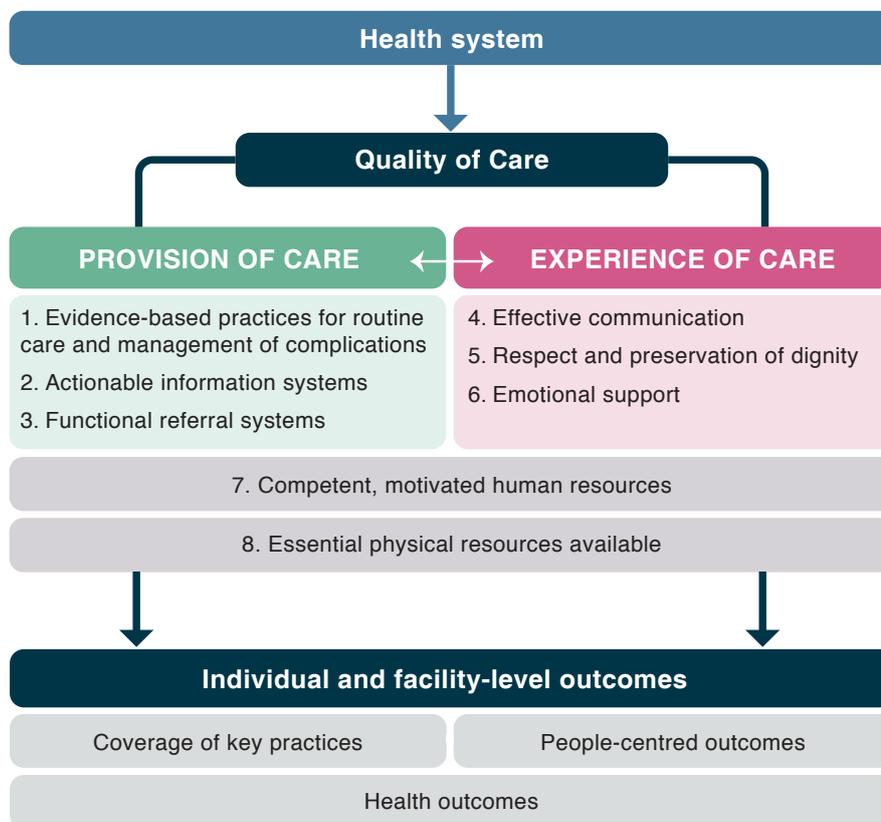
Standards for Maternal and Newborn care were developed and published by WHO in 2017 (Fig. 28). WHO, UNICEF and UNFPA regional and country offices, with partners, are supporting the implementation of these standards, in tandem with the Network for Improving

the quality of maternal, newborn and child health, with a secretariat at WHO Headquarters. New standards for the care of small and sick newborns are in development and will be published in 2019.

Work is also underway to implement the Midwifery Education Framework and Action Plan which launched at the World Health Assembly in 2019.

Additional work is underway to define respectful newborn care.

Fig. 28. Improving quality standards for maternal and newborn care in facilities



Source: *Standards for Improving Quality of Care (WHO, 2016) (85)*.



FOCUS: Advancing Respectful Newborn Care and the Maternity Care charter

There has been growing recognition that quality of care includes not only the technical aspects of quality but also how care is perceived by users in the health system and that includes newborns. WHO's *Standards for improving quality of maternal and newborn care in health facilities* articulates the provision of and experience of care (Fig. 28.) (86)

The need to focus on the experience of care and do so from a human rights perspective, was articulated in 2011 in the Respectful Maternity Care (RMC) charter (87), a document based on existing widely-accepted human rights instruments. The RMC charter has since been used as a tool to inspire change within health care systems through incorporation into standards of care, professional training for providers, quality improvement initiatives and legislation, as well as informing women and families of their rights in childbirth.

There is growing recognition that the rights of both mother and newborn need to be well articulated to help families, providers and decision-makers better understand and ensure that the care provided is both high-quality and respectful. Currently, a group of 55 individuals from 26 organizations globally, coordinated by the White Ribbon Alliance, are developing an integrated charter, based on extensive legal research of global and regional instruments that define the rights of both childbearing women and their newborns. The charter represents the first time the rights of both mother and newborn have been articulated together and focuses on their well-being both individually and as a dyad to be taken care of together for the benefit of both.

The charter is based on human rights instruments such as the Convention on the Rights of the Child, the Convention on Elimination of all forms of Discrimination against Women, the International Covenants on Civil and Political Rights and on Economic, Social and Cultural Rights and others. It is also supported by regional human rights instruments such as, for example, the African Charter on Human and People's Rights, the American Convention on Human Rights, and the European Convention on Human Rights and Biomedicine, among others.

The updated charter recognizes that both childbearing women and newborns are highly vulnerable to mistreatment during childbirth and the ensuing months and neither may have an opportunity to leave a situation that is disrespectful, abusive or endangering their health and safety. Care needs to encompass basic human rights for the mother and newborn, including their rights to respect, dignity, confidentiality, privacy, information and informed consent, and freedom from all forms of ill-treatment.

⁸⁶ WRA, WHO, UNICEF, OHCHR, University of Southern California, Jhpiego/MCSP, Harvard University Maternal Health Taskforce, Save the Children, Population Council, USAID, University of St. Thomas Peavy School of Nursing, University of Bristol, Johns Hopkins University, *If/When/How: Lawyering for Reproductive Justice*, Council of International Neonatal Nurses, PATH, Columbia University, Global Alliance to Prevent Prematurity, Ideas42, Montclair State University, Project Concern International, Georgetown University Law Center, NYU School of Law, Lamaze International, Palladium, International Confederation of Midwives.



Rights that are particularly relevant to newborns

Like all children, newborns are entitled to all rights set out in the Convention on the Rights of the Child (CRC) (88). However, this age group has specific characteristics that must be taken into account (89):

- Acute vulnerability due to complete reliance on adults for all aspects of life;
- No possibility of articulating their views, meaning that “best interests” determinations will only be based on adults’ views;
- Physical characteristics, including particularly sensitivity to touch, light, etc.;
- Previous misconceptions such as the once widespread assumption that newborns did not feel pain.

With regard to their human rights, and particularly those in the Convention, the implications of these characteristics of newborns are diverse and significant in achieving progress towards the Every Newborn milestones. Examples include:

Non-discrimination (art. 2 CRC). The principle of non-discrimination is a guiding principle in the implementation of the CRCs. Among other implications, applying it means that some newborns need extra support to enjoy the same rights as all newborns. For example: a newborn with a mental or physical disability has the right to a full and decent life, in conditions which ensure dignity; he or she has the right to special care. Because of this, care workers need to be trained on how to avoid discriminatory practices.

Best interests (art. 3 CRC). Consideration of best interests must embrace both short and long-term considerations for the child. Health, social and other professionals taking care of newborns need to be trained on how to determine best interests. As the adults most likely to know what would be in the child’s best interests, parents should be empowered and listened to. However, professionals should be able to take over when parents do not act in the best interests of the child.

Right to life, survival and development (art. 6 CRC). Development is a holistic concept that includes many other rights from the CRC. Among other implications, this means that measures must be taken to prevent child mortality, combating diseases and restoring health, providing adequate nutrition and clean water.

Right not to be separated from their parents against their will except if in the newborn’s best interests (art. 9 CRC). Decisions to separate newborns from their parents are to be made only if in the best interests of the child, and alternative solutions should first be the extended family or other appropriate families.

Right to an identity (art. 7-8 CRC). Being registered at birth is necessary for newborns to access all other rights from the CRC. Registration facilities should be accessible to all and handing over of birth certificate should not be subjected to payment.

Other important rights that must be applied to newborns include rights to **privacy** (art. 16 CRC), to the **highest attainable standard of health** (art. 24 CRC), to an **adequate standard of living** (art. 27 CRC), **protection** against abuse and violence, injury, neglect, maltreatment (art. 19 CRC), and **protection** from abduction, sale and traffic in any form (art. 35 CRC).

Source: UNICEF, 2019.

Strengthening Midwifery Education

High-quality midwifery education is critical to the provision of high-quality maternal and newborn care, the achievement of UHC and for the rights of all women, newborns and their families. Yet there is increasing evidence to demonstrate a significant need to improve the quality of midwifery education. The WHO report *Global strategic directions for strengthening nursing and midwifery education 2016-20 (90)*, highlights this urgent need and also calls for policy development, leadership, intra- and interprofessional partnerships and greater investment in the health workforce

Taking forward this agenda to strengthen midwifery and nursing, UNFPA, UNICEF, WHO UNFPA and the International Confederation of Midwives (ICM), have prepared an action plan to transform midwifery education. The Framework for Action; *Strengthening quality midwifery education for UHC 2030 (2019)* was launched at the World Health Assembly 72 in May 2019 and sets out the evidence base and sets out seven key actions to transform midwifery education (91).

Quality midwifery care, provided by midwives educated to international standards, can reduce maternal and newborn mortality and stillbirth rates by over 80% and improve over 50 MNH outcomes. However, there is a startling under-investment in midwifery education and training, despite the major, positive and proven impacts of midwifery care for women and children.

A survey by WHO in 2018 to develop an understanding of midwifery educator competencies, found that among 134 midwifery schools in 88 countries less than 50% of midwifery educators felt confident to teach essential newborn care skills in any settings. They also lacked confidence in their ability to identify newborn complications, to teach postnatal care of the newborn as well as care of small and sick newborns.

Locations with the highest burden of mortality tend to have substantial shortages of nurses and midwives, particularly in rural and hard-to-reach areas. Recruiting, training, mentoring and retaining these health-care providers should be a priority for governments. Additionally, there is a role for health workers to strengthen parent's skills and competence in caring for their small, sick or high-risk infant; care by parents is proven to reduce stress and anxiety while also benefiting the newborn's weight gain and neurodevelopmental progress.

Quality midwifery education can be transformative for all our families, communities and societies. Midwives who are educated, trained, resourced, regulated, licensed and integrated into health systems can provide the great majority of maternal and newborn care and thus reduce the heavy pressures on health service resources.

FRAMEWORK FOR ACTION



STRENGTHENING QUALITY MIDWIFERY EDUCATION for Universal Health Coverage 2030



4.3 Research and Innovations

Global initiatives to innovate in maternal and newborn health

1. **Laerdal's Safer Births Bundle** is a set of therapeutic and training tools that integrate improved monitoring of the fetus and newborn resuscitation in a quality improvement system. A study finalized in 2018 on the impact of implementation of Laerdal's Helping Babies Breathe programme in 128 facilities in Uganda found a 62% decrease in early newborn mortality after implementation.
2. **Project ECHO (Extension for Community Health-care Outcomes)** is following Helping Babies Survive and Helping Mothers Survive training to build the capacity of providers and to improve the quality of MNH outcomes.
3. **50000 Happy Birthdays** by ICM entails simulation-based educational programmes to train, equip and empower midwives to save more lives at birth, and also contributes to reducing morbidity and ensuring a better birth experience.
4. **The Safe Delivery app** that empowers skilled birth attendants is currently being implemented across sub-Saharan Africa and south-east Asia by the Maternity Foundation.

Multimodal e-Learning package for training in care of preterm newborns

The WHO-Collaborating Center for newborn education and training at AIIMS, New Delhi India created a multimodal educational and training package for optimal preterm care with the philosophy of "Do No Harm" to improve care for 'small and sick newborns'.

Cost-effective alternative forms of education and training are required in order to ensure evidence-based practices in the field and the training of large number of healthcare providers spread over vast geographical areas in the country. Digital technology is seen as a simple yet effective tool for improving knowledge and skills leading to good clinical practices. With the understanding that e-learning resources are a good tool for initial training and also refresher trainings for continuing education of healthcare providers, an e-learning evidence-based package for good quality care of preterm babies has been developed. This includes skill building by simulation and hands-on clinical training and evaluation of knowledge and skills using Objective Structured Clinical Examination.

The e-learning preterm care package is developed as a user-friendly mobile application which provides a stepwise; modular approach to manage preterm neonates ensuring evidence-based practices based on WHO guidelines and recommendations, wherever available. For conditions where WHO guidelines are not available, best clinical practices recommended by neonatologists are employed. The mobile apps are used for self-learning and the users can start with any one module and complete the modules in any sequence; based on their need and preference. However, within a module each learning objective must be completed in a systematic sequence. There is a timed self-assessment multiple choice questionnaire (MCQs) at the end of each objective in a module. The user has three attempts to pass each learning objective.

The App features educational content being delivered as 110 video clips, 55 webinars, self-reading scripts and self-explanatory flow-charts. The duration of videos and webinars are short with a median time being 5 minutes. The mobile App is available free of cost for download by healthcare professionals (doctors and nurses) on android and iOS devices. Once downloaded the App can work offline (except for links) and MCQs (which need to be submitted online and is available at www.pretermcare-eliminatingrop.com).

4.4 Champions

Every child alive campaign

Launched in February 2018, UNICEF's *Every child alive* campaign is an urgent appeal to governments, business, health-care providers, communities and individuals to fulfil the promise of UHC and keep every child alive (92). The campaign aims to build consensus for the principle that every mother and every baby deserves affordable, quality care. The global campaign is adapted to national contexts, as UNICEF and its partners work to achieve the agenda to keep every child alive through advocacy, public engagement and resource mobilization.

The Agenda to keep every child alive

1. Invest financial resources in health systems beginning at the community level.
2. Equip primary health facilities with the drugs, supplies and equipment needed to save maternal, newborn and child lives.
3. Recruit, train and monitor health personnel to support quality care during pregnancy and delivery, and for improved newborn and child health and nutrition.
4. Establish clean, functional health centres close to where women and children live.
5. Empower adolescent girls and women to demand and access quality health services.
6. Register all births, newborn deaths and stillbirths.



SPOTLIGHT: Parents associations driving World Prematurity Day

Across the world on 17 November each year, buildings light up in purple to recognize World Prematurity Day, which aims to raise awareness of the burden and challenges of preterm birth globally. An estimated 120 countries participated with activities in 2018 and 200 purple lightings took place.

The day was initiated by the European Foundation for the Care of Newborn Infants and partnering parent organizations in 2008. Ten years later, countless individuals, hospitals and organizations from all over the world have joined forces to help address preterm birth and improve the situation of preterm babies and their families.

From World Prematurity Day, data has been gathered from 35 national parent organizations and 30 international professional societies who supported the 2018 motto “working together”. The US-based organization Every Premie Scale launched its “do no harm” technical brief; UNICEF hosted events in countries and organized an information session with affected mothers and professionals in its New York headquarters; Save the Children organized events in numerous countries; the Healthy Newborn Network (HNN) reported 1128 unique views and 1442-page views from its World Prematurity Day landing page.

The global World Prematurity Day Facebook page counted about 3.5 million hits between 1-19 November 2018 and 51 000 tweets on Twitter.

SPOTLIGHT: Documenting what women want

The **What Women Want Campaign!** is a global advocacy initiative to improve quality maternal and reproductive health-care services for women and girls and to strengthen health systems. During the Women Deliver conference in Vancouver, Canada in 2019, the campaign’s global results were released to give a voice to women and girls making sure their health-care demands are heard by global health leaders. What Women Want heard directly from at least 1 million women and girls worldwide about how they define quality maternal and reproductive health care. The survey of 1.2 million women from more than half of the world’s countries found that the thing women most wanted from reproductive and maternal health services was to be treated with respect and dignity. After that requirement, the women, who were asked an open ended question about their health needs, said that they would like clean water, sanitation, hygiene, and adequate medicines and supplies (93).

4.5 Accountability

Accountability efforts have received increasing attention and ensuring accountability for the provision of quality care should remain central in programmatic efforts. At the national level, stakeholders including civil society, independent researchers, academics, champions and influential persons need to exert continuous pressure and work with government to ensure the provision of high-quality services. These accountability efforts will be strengthened when combined with local outreach and civil society activities such as citizens' reports cards and public hearings that help draw attention to the performance of the health sector.

Ongoing work by global partners towards accountability for maternal and newborn health

Mechanisms at the global level such as the EWEC Global Strategy and *Countdown to 2030* reports have proved to be useful in tracking progress and identifying inequities and gaps. In addition to the effort to track RMNCAH financing, global accountability activities in progress include:

1. Tracking and accountability of MNH-related commitments to the EWEC Global Strategy

PMNCH is tracking commitments annually as part of the EWEC and H6 workplan. An analysis of the progress reported by non-state commitment-makers was incorporated into a report on commitments to the Global Strategy, detailed analyses of commitments in humanitarian and fragile settings and commitments for adolescent health and well-being. All three reports were launched at the PMNCH Accountability Breakfast during the UN General Assembly in New York on 23 September 2018.

2. The Healthy Newborn Network: ensuring a platform for data and evidence on maternal and newborn health

Access to the most recent data on neonatal mortality, coverage of interventions, funding trends and human resources is an important factor in changing the trajectory of newborn survival. The Healthy Newborn Network (HNN) functions as the Every Newborn knowledge management hub.

It aims to improve the understanding and use of data in making decisions about strategic newborn health interventions. It provides a central location of the most recently published data relating to newborn survival and health, including mortality estimates, causes of death, coverage, contextual indicators, human resources and financing indicators.

A comprehensive database can be downloaded with an extensive list of indicators for 197 countries. This also includes an interactive tool for data visualization that allows users to make graphs quickly and easily. The multidimensional query functionality of the tool makes it easy to select multiple indicators and countries. The heat maps visually demonstrate cross-country comparisons of indicators across countries. Easy access to such data by health workers, public health practitioners and researchers in high-burden countries will be crucial for ensuring data-driven decision-making, accountability and progress towards newborn health targets.

Box 6. Low referencing of newborn health and stillbirth in EWEC Commitment Tracking (2018)

Key findings

1. A content analysis of all commitments concluded that newborn health, stillbirths, SRH and rights' laws and regulations were only targeted by a limited number of commitments and require more attention. Only 5% of commitments reference stillbirth.
2. Commitment-makers are delivering on their pledges and are on their way to disbursing the US\$ 35 billion pledged to the EWEC Global Strategy. Examining key indicators under the "survive" objective, maternal mortality was the most commonly referenced indicator (50% of commitments), followed by adolescent mortality (44%), and under-five mortality (41%).
3. 27% of commitments were made to support improving women's, children's and adolescents' health in humanitarian and fragile settings. This is a low proportion given that 535 million children were living in countries affected by emergencies in 2017.

Source: PMNCH EWEC Commitments Report (94)

3. Urgent need to accelerate accountability for preventable stillbirths

The 2016 *Lancet Ending Preventable Stillbirths series* (29) sought to highlight missed opportunities and identify actions for accelerated progress to end preventable stillbirths. The series concluded with a Call to Action.

The Call to Action covers three distinct areas (1) 2030 mortality targets, (2) universal health care coverage targets, and (3) global and national milestones for improving care and outcomes for all mothers and their babies (as specified by the Every Newborn Action Plan) and specifically for women and families affected by stillbirth.

To advance the call to action proposed in the *Lancet Series on Ending preventable stillbirths* in 2016, the Stillbirth Advocacy Working Group (SAWG) was established in 2017 by PMNCH. The group serves as a hub for global advocacy action and accountability for stillbirth prevention and post-stillbirth bereavement support.

It works through (i) network development and support, (ii) increasing data visibility and linkage to accountability mechanisms, (iii) seizing key moments, and (iv) empowering parents as global advocacy actors. In 2018, the SAWG had members from more than 50 organizations and was co-chaired by the International Stillbirth Alliance and LSHTM.

In 2018, SAWG released the inaugural version of its *Ending preventable stillbirths scorecard* (Fig. 29) at the 2018

International Federation of Gynecology and Obstetrics World Congress in Rio de Janeiro, which aims to track global progress against the *Lancet's* call to action. The 2018 scorecard showed that only 23% of high-burden countries have a national stillbirth target and that many data gaps remain, with no tracking of subnational stillbirth rates, quality of antepartum and intrapartum care, or reduction of stigma associated with stillbirth (Fig.29).

SAWG monitors the visibility of stillbirths in UN and other high-level publications. Attention to stillbirths seems to be gradually increasing, however shortcomings remain such as the absence of any mention of stillbirths in UNFPA and UNICEF strategic plans for 2018-2021. SAWG also provided feedback on key UN reports and engaged in national-level action, such as tabling a submission for the Australian Senate's Select Committee on Stillbirth Research and Education.

Future SAWG plans include: supporting the development of country-specific versions of the scorecard in Ethiopia, Nigeria and other high-burden countries, as well as versions for high-income settings; incorporating user feedback into a revised version of the scorecard early in 2020 with translation into several languages; producing a second annual "visibility" review of UN reports' attention to stillbirths; continuing its monthly blog series on stillbirths in the HNN; establishing a global registry of parent support organizations; and placing SAWG representatives at key national, regional and global events such as Women Deliver and the World Health Assembly, to help ensure stillbirth is not forgotten.



Fig. 29. Global Progress towards ending preventable stillbirth

	INDICATORS	Global	High Burden Countries		
			All	Africa	Asia
Mortality targets by 2030	1.1 Countries with Newborn Plan	●	●	●	●
	1.2 Countries with stillbirth rate target	●	●	●	●
	1.3 Countries achieved stillbirth rate global target	●	●	●	●
	1.4 Countries with a subnational Newborn Plan	●	●	●	●
	1.5 Countries with stillbirth rate equity target	●	●	●	●
	1.6 Countries reporting subnational SBRs	●	●	●	●
UHC: Family planning	2.1 Additional users of modern methods of contraception	●	●	●	●
	2.2 Percentage demand for contraception satisfied	●	●	●	●
	2.3 Countries with reproduction health plan	●	●	●	●
UHC: Antenatal care	3.1 Availability of global standards for antenatal care	●	●	●	●
	3.2 Antenatal care	●	●	●	●
	3.3 Quality of antenatal care	●	●	●	●
UHC: Care during	4.1 Global standards for intrapartum care	●	●	●	●
	4.2 Antenatal care	●	●	●	●
	4.3 Quality of antenatal care	●	●	●	●
Milestones	5.1 MNH Quality improvement	●	●	●	●
	5.2 Perinatal Death Review systems	●	●	●	●
	5.3 Research focusing on stillbirths planned by country	●	●	●	●
	5.4 Respectful care after a death	●	●	●	●
	5.5 Reduce stigma	●	●	●	●

LEGEND:

- Achieved
- On track
- Making progress
- Slow progress
- Not applicable

REFERENCE:

Stillbirth Advocacy Working Group (2019)

4.6 Financing

Ensure that investment in MNH is sustained in the post-2015 development era through advocacy and resource tracking.

Inadequate financing for health systems is a common bottleneck to achieving optimal health outcomes. A strong health system must be backed by adequate funding, strong health plans and evidence-based policies. Specific budget lines for maternal health, newborn health and stillbirths are often missing from national and subnational health budgets, and care for small and sick newborns is rare in financial protection schemes.

Strong political commitment can ensure that the limited resources that do exist are invested judiciously to build strong health systems that prioritize maternal and newborn. The Universal Health Benefit Package, being defined by WHO, includes the recommended interventions by level of care, and along the life-cycle continuum, with greatest impact on survival, health and well-being of newborns, and the recommended interventions to improve maternal health and survival and prevent stillbirths. This UHC package should be prioritized for health-care financing and will represent an opportunity to drive national-level investments.

Do we have the financing we need?

Globally, there is a downward trend in overseas development assistance. In April 2019, the OECD's Development Assistance Committee (DAC) released

the official development assistance (ODA) figures for 2018, which found that foreign aid from official donors fell 2.7% from 2017, with a declining share going to the neediest countries. ODA outflows fell in 12 countries, with the largest declines in Austria, Finland, Greece, Italy, Japan and Portugal (96) (97).

Work is underway to improve RMNCAH finance tracking with the OECD. In May 2018, PMNCH and Countdown to 2030 established a **Joint Technical Working Group for the Tracking of Financing for Sexual, Reproductive, Maternal, Newborn, Child and Adolescent Health**; with the mandate to increase alignment of, and reduce duplication by, all stakeholders, to create more robust tracking processes overall, and to inform better use of resources for women's, children's and adolescents' health at the centre of UHC.

Achievements in 2018 included the development and endorsement of an improved method of estimating ODA for WCAH, "Muskoka 2", which was presented at a meeting of the OECD DAC in Paris in November 2018. In 2019, the working group, supported by PMNCH, will agree on an agenda for domestic financial tracking and will pilot the Muskoka 2 methodology with interested donor countries.



Global financing facility for RMNCAH+N

The Global Financing Facility (GFF) was established to close the financing gap for RMNCAH and nutrition, but it is not sufficient solely to generate additional funding: these resources must be focused on achieving results (Fig. 30).

The GFF approach is grounded in the goals that countries have already set: towards the SDGs. Improving stillbirths, maternal health and newborn health by strengthening health systems must be central in investment cases for GFF support in high-burden countries. The GFF can play a catalytic role in bringing together multiple financing sources for MNH in a synergistic, country-led way that closes the funding gap for maternal health, newborn health and stillbirths by 2030.

Fig. 30. Global financing facility countries 2019

Global Financing Facility: Partnership for results



GLOBAL FINANCING FACILITY



HOW THE GLOBAL FINANCING FACILITY WORKS

- Brings partners together around country-led prioritized investment case to end preventable deaths and improve health outcomes for women, children and adolescents.
- Catalyzes financing with modest Trust Fund grants to increase domestic resources alongside IDA/IBRD, aligned external financing and private sector resources.
- Supports multisectoral solutions and financing leading towards Universal Health Coverage.
- Leverages private sector and innovative financing tools.

VALUE ADD FOR HUMAN CAPITAL DEVELOPMENT IN AFRICA

- Technical agendas of GFF and Africa Human Capital Plan are aligned around common topics: improving coverage and access to quality reproductive, maternal, newborn, child and adolescent health and nutrition services, sexual and reproductive health and rights, and education of adolescent girls.
- GFF's partnership under government leadership can be leveraged to support the implementation of the Africa Human Capital Plan.
- Current GFF investment in AFR = USD 488m grant funding linked to USD 3,353m IDA/IBRD resources.

GLOBAL FINANCING FACILITY COUNTRIES IN AFRICA

CURRENT

Burkina Faso
Cameroon
Central African Republic
Cote d'Ivoire
Democratic Republic of Congo
Ethiopia
Guinea
Kenya
Liberia
Madagascar
Malawi
Mali
Mozambique
Nigeria
Rwanda
Senegal
Sierra Leone
Tanzania
Uganda

ELIGIBLE

Angola
Benin
Burundi
Chad
Comoros
Republic of Congo
Eritrea
The Gambia
Ghana
Guinea-Bissau
Lesotho
Mauritania
Niger
São Tomé and Príncipe
Somalia
South Sudan
Sudan
Swaziland
Togo
Zambia
Zimbabwe

AFR: Africa GFF: Global Financing Facility; IDA: international development assistance; IBRD: International Bank for Reconstruction and Development; USD: United States dollars

4.7 Coordination

Ensure coordinated support among UN partners, donors, academics, non-governmental organizations and the private sector, and intensify efforts in the 20 countries that account for 80% of all newborn deaths.

ENAP called for partner collaboration and coordination to support country efforts to end preventable newborn deaths, stillbirths and disabilities.

“Putting the action plan into practice will require participation of many stakeholders, ranging from governments and policy-makers, donor countries, the United Nations and other multilateral organizations and global philanthropic institutions to civil society, health care workers and their professional associations, the business community, academic and research institutions”.

Since the endorsement of ENAP, regional and global support for its implementation has been led by UNICEF and WHO.

At the regional level UNICEF and WHO regional offices have established and are implementing MNH strategies:

- The WHO Regional Office for South-East Asia established newborn health as a regional flagship priority in *Strategic framework for improving neonatal and child health and development* and a new strategy has been completed for the period 2018-2025.
- In the WHO Western Pacific Region, an *Action plan for health newborn infants (2014-2020)* is being implemented. Steady progress has been made to scale-up early essential newborn care in eight priority countries, reaching 27 727 health workers in 2258 health facilities with skills built up through coaching.
- WHO European Region key activities for newborns are part of the *Action plan for sexual and reproductive health: towards achieving the 2030 Agenda for Sustainable Development in Europe – leaving no one behind*, adopted by the 66th session of the Regional Committee for Europe in September 2016.
- WHO Eastern Mediterranean Region following an interagency meeting in 2016 hosted by UNFPA, UNICEF and WHO for Ministries of Health in the region, countries in the region identified five key priority actions for each of the ENAP strategic objectives to be integrated into national strategic RMNCAH plans and agreed on a set of recommendations that will support countries in ending preventable neonatal mortality and morbidity.

- WHO Africa Region key activities for newborn health are set out in the *Global Strategy for Women’s, Children’s and Adolescents’ Health 2016-2030: implications for the African Region, 2016-2020* adopted by the 66th Regional Committee for Africa in August 2016.
- In the WHO Region of the Americas, the *Regional strategy and plan of action for neonatal health within the continuum of maternal, newborn and child care*, is being implemented.

At the global level, WHO and UNICEF co-chair the Every Newborn Management Team since 2014.

The team works to coordinate work at the global level in support of country and regional efforts. Coordination activities include, monthly calls of working groups, an annual face-to-face meeting to review progress and define work, tracking progress.

Global level activities and outputs to support countries and regions to achieve the Every Newborn Milestones are coordinated through the development and implementation of the Every Newborn Results Framework. The framework also sets out work to ensure the global maternal and newborn health community are meeting the global milestones. The Results Framework is prepared for two years of work. The 2019-2020 Results Framework was endorsed by the Every Newborn management team in November 2018.

This 2019-2020 Results Framework builds on the successful implementation of the 2017-2018 framework and sets out activities to be undertaken in 2019 and 2020 to reach specific outputs by December 2020. Technical working groups for activities, or groups of activities take forward the agreed activities, and report periodically to the Every Newborn management team. The framework is seen as a living document to which new activities and outputs can be added as required. In endorsing the Results Framework and driving action to realize these outputs, the global maternal and newborn health partners, including the UN, donors, academics, nongovernmental and health professional associations, and the private sector, can collectively ensure effective coordinated effort in support of country action.

A copy of the 2019-2020 Every Newborn Results Framework can be found at <https://www.healthynewbornnetwork.org/issue/every-newborn/>



5. Moving forward to 2020 and beyond

The data from the Every Newborn tracking tool identifies clear immediate gaps that require planning and investment.

With years to the SDGs, efforts must be intensified to address the causes of stillbirth, newborn death and disability, improving the quality of maternal and newborn care and scaling-up coverage of all proven interventions along the continuum of care.

“High-quality health systems could prevent 1 million newborn deaths and half of all maternal deaths each year” concluded the Lancet Global Health Commission in 2018. As countries expand their health systems towards achieving UHC, both access to care and quality of care will be critical for ending preventable maternal, newborn and child deaths by 2030, as targeted by the SDGs. Without increased planning and investment, the SDG target for newborn mortality reduction is in jeopardy of not being reached. National leadership, financing and donor support for increased sustained funding is particularly urgent in the following areas:

- In all high-burden countries an urgent need exists to intensify effort for maternal and newborn health quality of care improvement planning and investments through:
 - Policies to deliver quality people centred care, inclusive of antenatal and postnatal care, logistic management information systems, perinatal death audits and community engagement are well implemented with full population coverage.
 - Timely costing and budgeting of national plans and directing investment to a complex response system that cuts across sectors including water, sanitation and hygiene (WASH), strategic education and human resources for health, particularly for quality midwifery and neonatal nursing competencies that are in high demand and short supply.
 - Provision of quality maternal and newborn care through a well-trained, mentored and supported workforce. Building the neonatal care competencies of existing providers and creating or expanding neonatal nursing cadres is a crucial step to improving the quality of care for those babies born too soon, too small or who become ill.
 - Full integration of stillbirth into the quality of care improvement agenda with the recognition that most stillbirth, and without question, intrapartum stillbirth is a marker of quality of maternal care.
- No country has reduced its newborn mortality rate below 15 deaths per 1000 live births without investment in specialist care for small and sick newborns.
- Technological innovations that can provide cost-effective springboards for progress: including better logistics’ management to ensure that the essential commodities to save lives and prevent life-disability are at the point of service delivery; and improved digital health for health monitoring and outreach.
- Research on newborn health, including stillbirth and social and behavioural change education, requires investing in cadres of researchers, building expertise, disseminating and using the findings to inform policy development and implementation improvement.
- Improve data collection and use to ensure all deaths are reported and reviewed, and that a birth and death certificate is produced for every child, including stillbirths, key indicators are captured in health information management systems and programmatic coverage of health interventions is monitored to ensure universal access to and coverage of quality care.

For countries with the highest rates of newborn mortality, 80% of which have experienced recent or continuing humanitarian crises, action is most urgently needed. First, to ensure that pregnant women and newborns are adequately included in emergency preparedness, recovery planning and investment; and second, to build responsive health systems for overall sustained development.

There is an urgent need for increased national leadership to transform health systems to ensure quality improvement for all populations. This requires ensuring quality at each moment along the continuum of care which will improve pregnancy and birth outcomes, from quality maternal health when required beginning from adolescents through to the nurturing care needed in the early moments of every individual’s life. The UNICEF and WHO Child Health redesign currently in progress is an important opportunity to springboard further progress for newborns.

The ability of a health system to meet these needs to end preventable stillbirth and newborn deaths and improve the health outcomes for its smallest and most vulnerable population, is an important barometer of its effectiveness.



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